LETTERS

Comment on Published Article

DEAR SIRS: We are most interested to note in the recent issue of THE BULLETIN OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS (12:62, January-February, 1955) the article entitled "The Effects of Antihistamines and ACTH on Temperature Rise Due to Pyrogen Reaction in Rabbits," by Gerald M. Stahl and W. Howard Hassler of the School of Pharmacy of the University of Tennessee.

Reference was made therein to the application of certain antihistamines in the suppression of pyrogen temperature rise in experimental animals. Using three test rabbits and three rabbits as controls, the injection of pyrogen solution was accompanied by or with the administration of antihistamines, with rectal temperature recordings taken immediately prior to the experiment and at hourly intervals thereafter.

We noted that these workers employed our "Chlor-Trimeton Injection" 10 mg. per ml. in dosage of 0.4 mg. per Kg. B.W., rabbit. They stated that chlorprophenpyridamine maleate did not appreciably change the course of the pyrogen reaction, and showed a temperature increase in °C. of 0.8, 1.03 and 1.27 on successive hourly recordings. The data as presented by Stahl and Hassler are in accord with our own unpublished laboratory reports which have shown that using yeast suspension as pyrogen in rats, "Chlor-Trimeton" at 10 mg. per Kg. p.o. is inactive as an antipyretic, where as aminopyrine and aspirin are inactive as well at 10 mg. per Kg. p.o. but active at 50 mg. per Kg. p.o. according to Dr. William H. Govier, Director of Pharmacology Department in Schering's Research Laboratories.

These results, however, are particularly in conflict with a long series of clinical studies which have been published in the literature over the past several years. All of these indicate the value of chlorprophenpyridamine maleate ("Chlor-Trimeton") injection 10 mg. per ml. in the prevention of pyrogen and allergic reactions in blood and other transfusions.

The authors established that antihistamines in general did not prevent a rise in temperature due to pyrogens, under the specific conditions of their experiment. If such had occurred, this would mean that they are very good antipyretic compounds, which is not true. We believe that it is pretty generally accepted that the rabbit is extremely sensitive to pyrogenic reactions. Also, the handling, storage, and administration of blood and other transfusion liquids certainly differ from the procedures used in this experiment.

You will note our advertisement in the same issue of THE BULLETIN OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS (page 13) presents these facts, documented by the following references:

1. SIMON, S. W., and ECKMAN, W. G., JR.: *Ann. Allergy 12*:182, 1954.
2. FRANKEL, D. B., and WEIDNER, N.: *Ann. Allergy 11*:204, 1953.
3. OFFENKRANTZ, F. M.; MARGOLIN, S., and JACKSON, D.: *J. Med. Soc. New Jersey 50*:253, 1953.

Other references on the subject are referred to in the literature on the subject, copies of which I am supplying to you and to Gloria Niemeyer for your information.

While the title of the paper by Stahl and Hassler specifically limits the scope of the work to a consideration of temperature rise due to pyrogen reactions, there appears to be an unjustified inference read into the discussion and summary. The growing list of clinical papers and the widening usage of "Chlor-Trimeton Injection" for the prevention of allergic and pyrogenic reactions in humans provide ample evidence of the value and effectiveness of this antihistamine for this use.

JOHN N. MCDONNELL, *Vice-President*
Schering Corporation
Bloomfield, N.J.

Reprint Requested

DEAR SIRS: Would it be possible for you to send me a copy of the following article which appeared in the BULL. AM. SOC. HOSP. PHARM., Sept.-Oct., 1954: "Disintegration Time of Tablets," by T. C. Lezburg and J. T. Murphy.

Thanking you very much for your kind help, I remain

CARLOS M. P. WIRTH

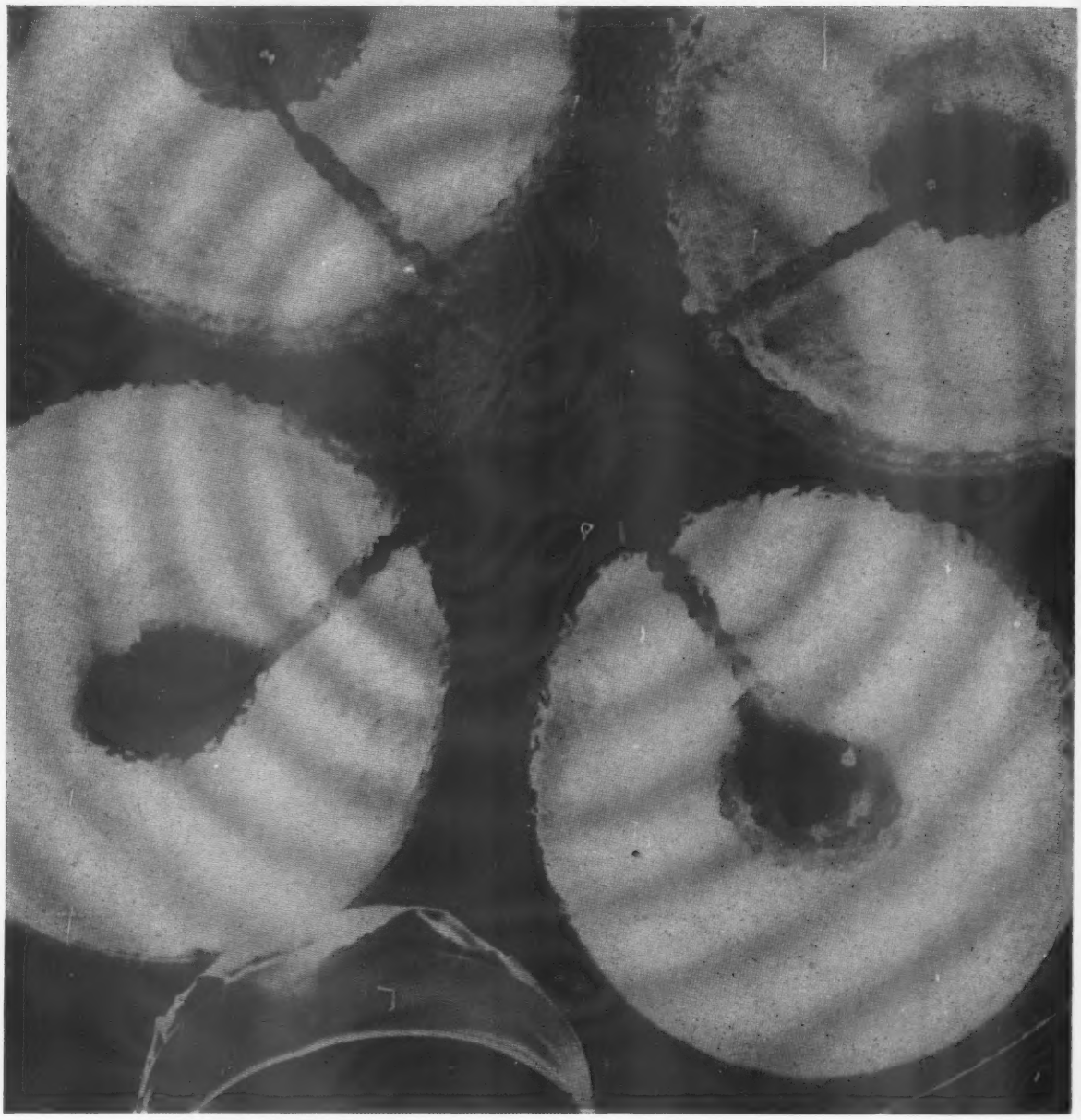
The Sydney Ross Co.,
Control Laboratory
Alabama 59, Mexico 18, D. F.

Bulletin is Worthwhile

DEAR SIRS: Please change my address for all future correspondence and also the address for the mailing list for your worthwhile BULLETIN. It has been a great aid to me in my work . . .

LESTER A. SHAPPELL

West Leesport, Pa.



Anesthesiologists find SURITAL sodium (thiamylal sodium, Parke-Davis) a versatile anesthetic, readily adapted to all operative and manipulative procedures and to all anesthesiologic technics. SURITAL causes little laryngospasm, bronchospasm, respiratory or circulatory depression. And patients are spared unnecessary distress because SURITAL affords rapid, smooth induction and recovery usually without nausea, vomiting or excitement.

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EDITORIAL

The Society Reports

by Don E. Francke

Once each year the Society, through its officers and committees, presents a report to its members. This stands as a permanent record of the progress made during the past year. Although the past year was a short Society year (due to the change in time of holding the annual meeting), an examination of the 60-page Proceedings Section beginning on page 385 will show that the officers and committees of the Society were not short on accomplishments.

Although the reports are voluminous they should be read and examined in detail by all members. Here it may be well to draw attention to what, to this writer, seem to be a few of the milestones of progress made during the past year.

The Hospital Formulary Service was approved and the Society decided to implement it as soon as possible. Decision was the action of last year's Executive Committee; the big task of implementing this decision is the charge of our present group of officers and committees, headed by Claude Busick. It should be reasonable to expect definite action when the Executive Committee meets in November, and a start on the formulary service should be made as soon as possible so that it will be available during the first half of 1956. This is easier said than done because the task is a large one. Still, its importance to the Society and its members is so great that means must be found to transcend the obvious difficulties. Perfection will not be achieved at once, but the formulary service will grow and improve as time and experience bring forth ways to perfect it.

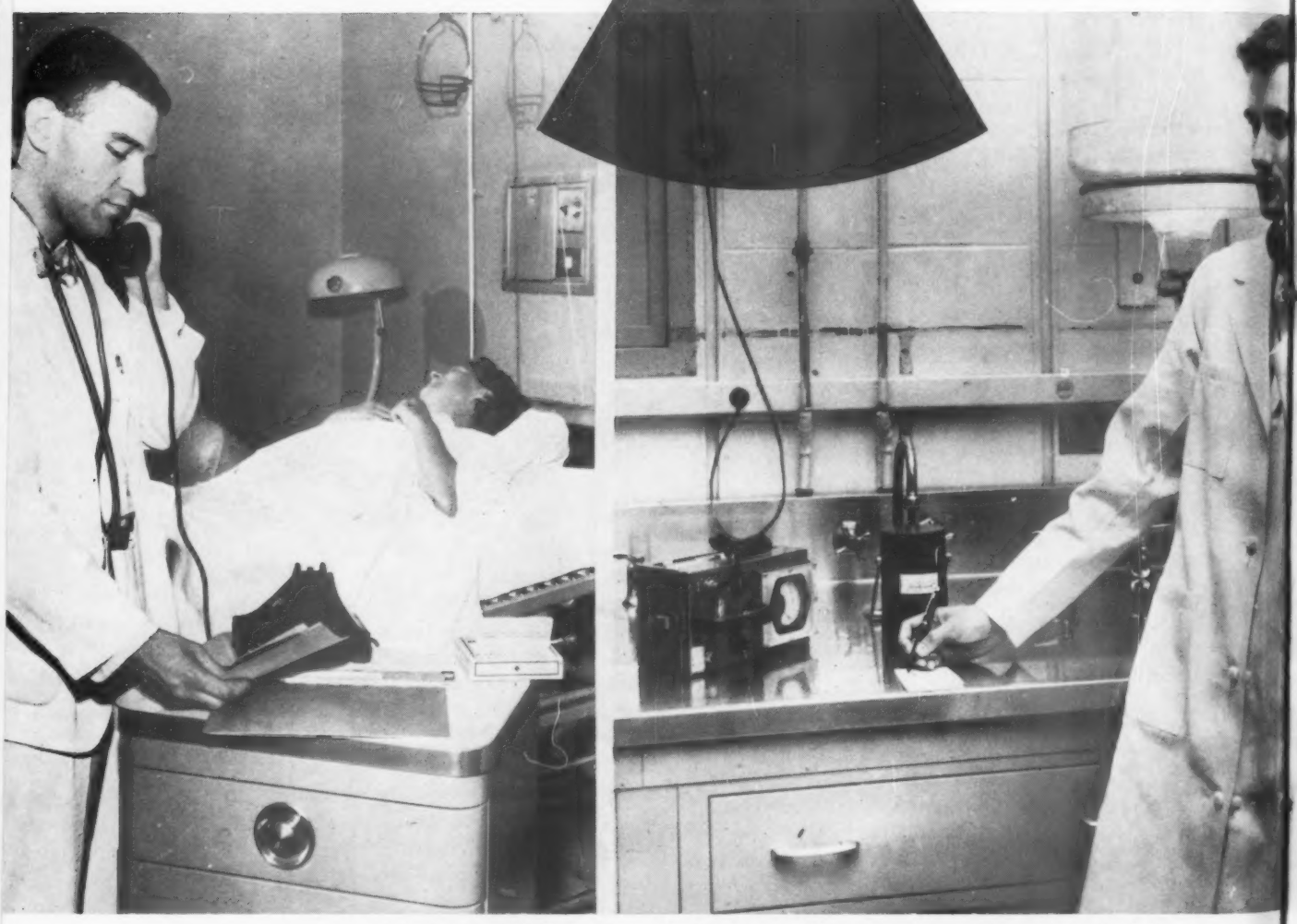
Another forward step during the past year was the development of an accreditation program for hospital pharmacy internships. Material on this subject was published in the Education and Internship number (May-June) of The Bulletin. While it is true that there is a great difference between a program and its implementation, it is highly probable that the Division of Hospital Pharmacy will begin its inspection program of internships next year. This is needed greatly, especially from the viewpoint of giving hospital pharmacists the right kind of helpful suggestions required to aid them in carrying out more valuable training programs.

Committee reports often foreshadow fundamental inovations. This year the reports of the Committee on Isotopes and the Committee on Pharmacy Operated Central Sterile Supply fall into this category. No one can deny that the scope of hospital pharmacy is expanding and that new ways are being found to utilize the special abilities of the pharmacist in hospitals. The pharmacy of few hospitals today handles radioisotopes. Still, there is no reason why a large number should not. The expansion of this specialized activity awaits the initiative of those who prepare themselves to undertake this responsibility.

Numerous hospital pharmacists are now in charge of the Central Sterile Supply Service of their hospitals. The trend appears to be growing and is well accepted by a fairly large group of administrators, although it is also opposed by others and by some in the nursing profession. While this year is not the first one in which the Society has received a report from a committee concerning central supply service, the reemphasis of this additional service will encourage others in hospital pharmacy to undertake such an activity. What is needed most at this time, it would seem, is for a fairly large number of hospital pharmacists to take steps through proper channels in their hospitals to offer this service. Such action will not be possible in all hospitals. Much depends upon local circumstances and more upon the background and initiative of the individual hospital pharmacist. But the more successful operations the Society can point to, the more readily will this function be assigned to hospital pharmacy.

These are but a few of the significant advances made by the Society during the past year. You will find many others within the Proceedings Section of this issue.

RADIOISOTOPES IN HOSPITAL PHARMACY

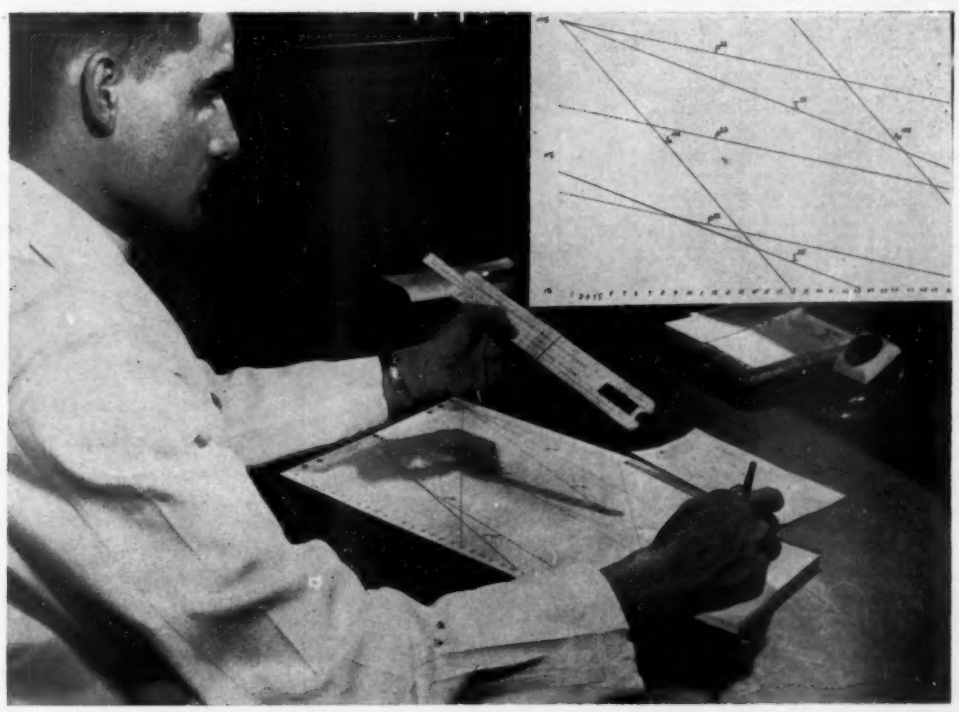


Radioactive medications at the University of Chicago are procured and dispensed by the Pharmacy Department. Frequently used radioisotopes are stocked in the Isotope Pharmacy and dispensed as requested for patient use. The physician (left), upon deciding to use a radioactive medication, calls the pharmacist and gives the necessary information. A survey instrument for measuring radiation is shown at the left side of the photo on the right.

A report of the ASHP Committee
on Isotopes (1955)
with illustrations depicting the
handling of isotopes
in the Pharmacy Department of the
University of Chicago Clinics

by **Clifton J. Latiolais**
Paul F. Parker
George Hutchinson
Robert A. Statler

THE CLINICAL APPLICATIONS of radioactive isotopes have now been developed to the point where most large and medium size hospitals must consider at least a limited isotope program. Hospital pharmacy should be in a position to offer its services in the development of such a program in the hospital. Since radioactive isotopes are a rather new field, President Archambault appointed a Committee to study the role of the hospital pharmacist and specifically (1) to develop suggestions for special courses for hospital pharmacists in the handling of isotopes in hospitals, (2) to determine the feasibility of an isotope section operated by the Pharmacy Department and (3) to determine layout and design for a radioactive isotope branch of a Pharmacy Department.



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The pharmacist figures the amount of solution necessary to provide the required dosage by using a decay chart and slide rule. The decay chart has a decomposition curve for each specific isotope. The percentage concentration and the time in days are plotted. For instance, if the isotope has a half-life of 10 days, it will have exactly one-half of its original activity after 10 days; 25 percent after 20 days; twelve and one-half percent after 30 days, etc. Or if the concentration by assay was 40 millicuries per ml., then in 10 days the concentration would be 20 millicuries per ml. and in 20 days, 10 millicuries per ml.

If pharmacists are to explore the possibility of handling radioisotopes, the relationship of these substances to pharmacy should perhaps first be established. These substances (i.e. iodine, gold, phosphorus, etc.) have been used for generations in some chemical form or another in the treatment of disease. As such, they have always been classified as drugs and have been supplied by pharmacists. By adding the property of radioactivity these drugs are modified but are still used in the diagnosis and treatment of disease and it is only logical that such substances be dispensed by pharmacists.

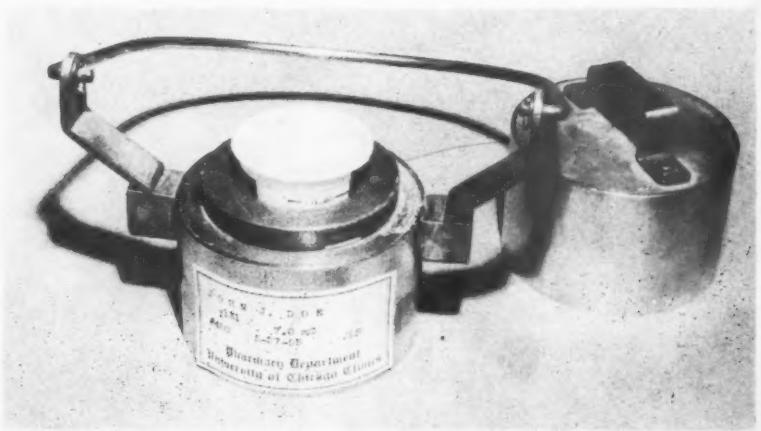
Role of Hospital Pharmacy

Some pharmacists are now providing an adequate and satisfactory radioisotope service in their hospitals. Before attempting such a program, however, the pharmacist must be trained in the handling of radioactive material and should know and understand basic concepts underlying radioactivity. These basic concepts are readily understood. Because of these facts, and because isotopes are pharmaceuticals, the Committee on Isotopes firmly believes that pharmacy is capable and within its field to undertake the activity of providing radioisotope pharmaceutical service in hospitals.

It was felt by the Committee that the basic need of the hospital pharmacist in this subject is a fundamental knowledge of radioactivity. In order to help solve this problem the Committee has compiled a bibliography of 31 references encompassing extensive basic information on radioactivity including the handling, procurement and dispensing of isotopes, the organizational aspects of a laboratory and its operation. It is hoped that this will give the pharmacist an ample start in his search for sufficient information and knowledge of the subject.

CLIFTON J. LATIOLAIS is Chief Pharmacist at Strong Memorial Hospial Rochester, N.Y.; PAUL F. PARKER is Chief Pharmacist at University of Chicago Clinics; GEORGE HUTCHINSON is a Senior Pharmacist, U. S. Public Health Service and ROBERT A. STATLER is a Pharmacy Specialist at the Central Office, Veterans Administration, Washington, D. C.

3 *A record of each shipment of radioisotopes is kept to show its ultimate disposition. The top section provides all data pertinent to the particular shipment and the entries show all data regarding each amount dispensed. The Isotope Pharmacy has handled approximately 500 shipments of radioactive material in two years.*



4 *The prescription for radioactive iodine is measured into a small paper cup which is carried to the patient in a lead container. The label shows the patient's name, name of drug (I_{131} — radioactive iodine), amount of drug, shipment number, date, and initials of dispensing pharmacist.*

5 ▸ *The required dosage is transferred from the stock container to the paper cup with a remote control pipette. The stock material is stored behind a barrier of lead bricks which is located in a hood in case any radioactive material is vaporized. The operation is carried out using a mirror which is mounted at an angle over the barrier. The pharmacist wears rubber gloves to prevent getting any radioactive material on his hands.*

The Committee has listed 22 films for use as audio visual aids on the subject of radioactivity. These films are available from the U. S. Atomic Energy Commission on a loan basis.

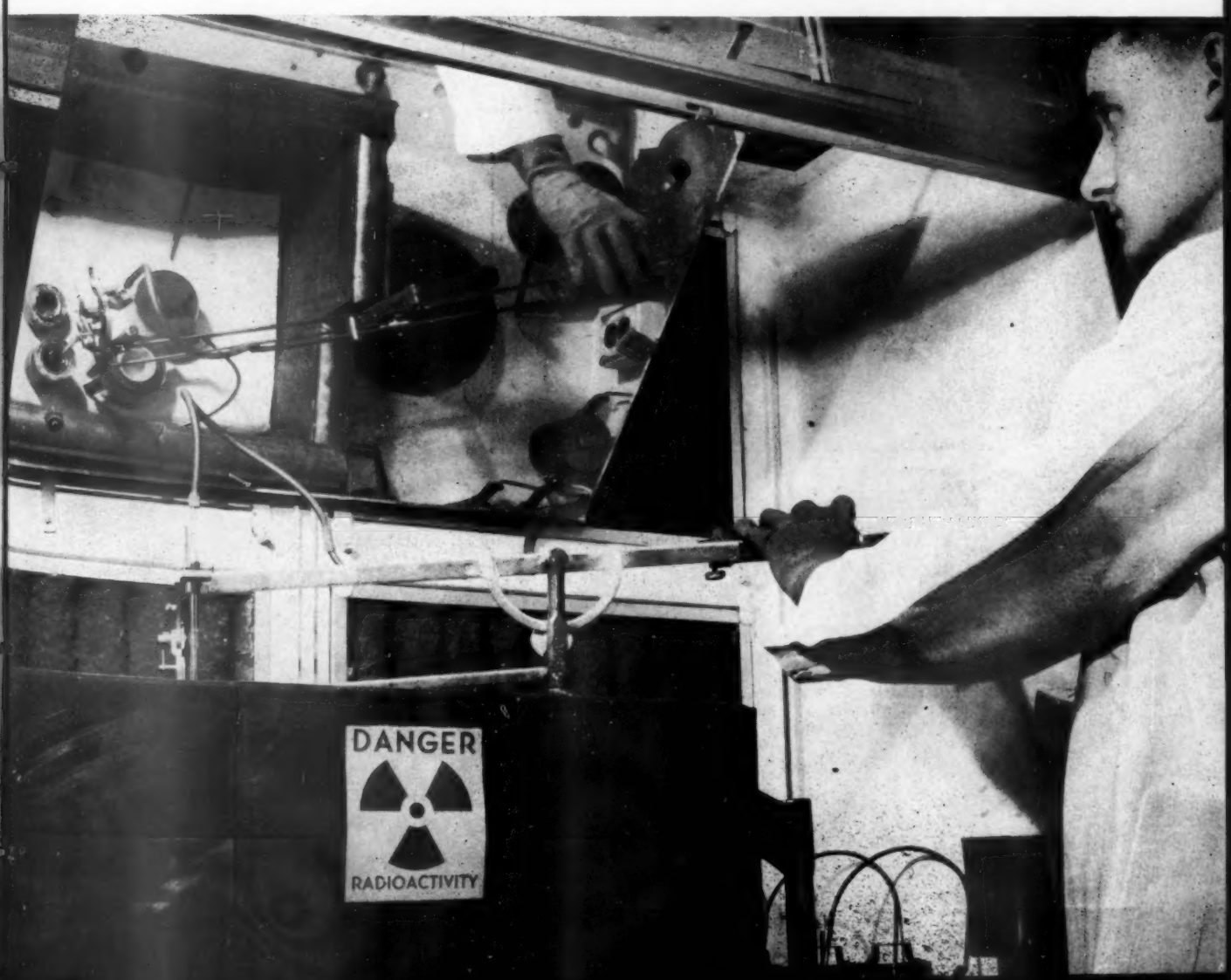
Courses Available

The Oak Ridge Institute of Nuclear Studies at Oak Ridge, Tennessee offers a one month course on the subject of radioactivity which is as extensive as any pharmacist would require in the dispensing of isotopes in a hospital pharmacy. However, there are some drawbacks to this training program in that most pharmacists are unable to leave their positions for that long a period of time, the cost of such a course, etc. The Committee has contacted the Radiological Health Program of the Department of Health, Education, and Welfare and the Isotopes Division of the Atomic Energy Commission and these two organizations have offered to work with the ASHP to develop a course specifically designed to meet the needs of the hospital pharmacist who wishes to work with isotopes. It may be feasible to work with the American

Audio Visual Aids (Films)

The following is a list of films available on loan from the United States Atomic Energy Commission, Oak Ridge, Tennessee dealing with radioactivity:

Fundamentals of Radioactivity
Properties of Radiation
Practical Procedures of Measurement Methodology
Principles of Radiological Safety
Practice of Radiological Safety
Agriculture Research
General Sciences
Engineering for Radioisotopes
Operation Greenhouse
Operation Crossroad
Bikini Radiological Laboratory
Operation Doorstop
Operation Sandstone
Atomic Physics
Primer for Monitoring
Unlocking the Atom
A is for Atom
The Atom and You
The Atom and Industry
Atomic Energy Can Be a Blessing
Report on the Atom



Association of Colleges of Pharmacy on this problem so that courses could be offered in conjunction with colleges of pharmacy in regional areas. Courses could be given at weekly or two week intervals, on weekends, for the required period of time. This plan would eliminate some of the problems of attending the Oak Ridge course.

The Committee submits a proposed Outline for A Course in Isotope Pharmacy which is rather encompassing and should cover sufficient information to a pharmacist wishing to work with radioactive isotopes in the hospital.

Part I — Introduction

I. Radioisotopes and Modern Pharmacy
   - A. General discussion
   - B. Importance of this course to pharmacists

II. Fundamental Principles of Nuclear Physics and Chemistry
   - A. Review of the structure of the atom
   - B. Characteristics of atoms and nuclei
   - C. Radioactive elements and disintegration series
   - D. Radioactivity units and standards
   - E. Radioactive decay and constants

III. Production of Radioisotopes
   - A. Methods of preparation
      1. Particle accelerators
      2. Chain reacting piles
   - B. Separation and purification
   - C. "Labeled" isotope compounds

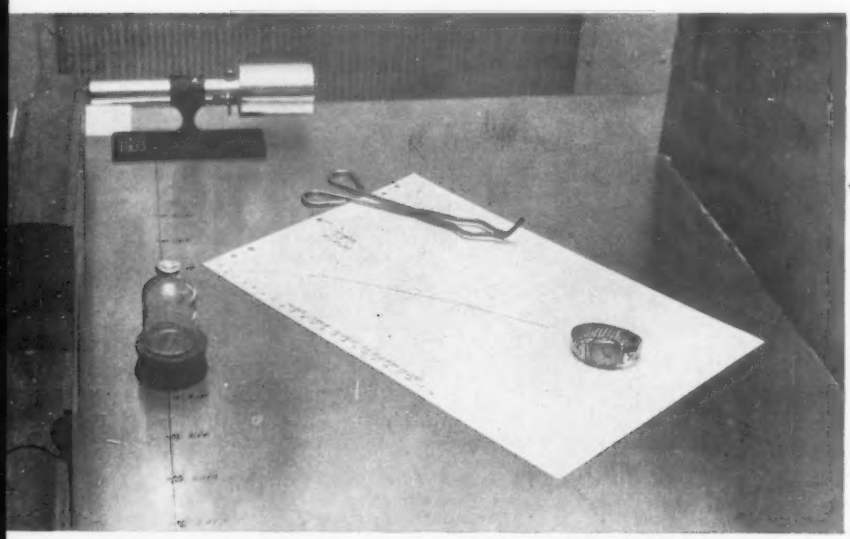
IV. Availability and Means of Procurement of Isotopes
   - A. Availability
   - B. Allocation requirements

V. Instrumentation
   - A. Methods of detecting radiation
   - B. Measurement of radioactivity
      1. Use of statistical method in measurement
   - C. Personnel protection, laboratory surveying, and monitoring

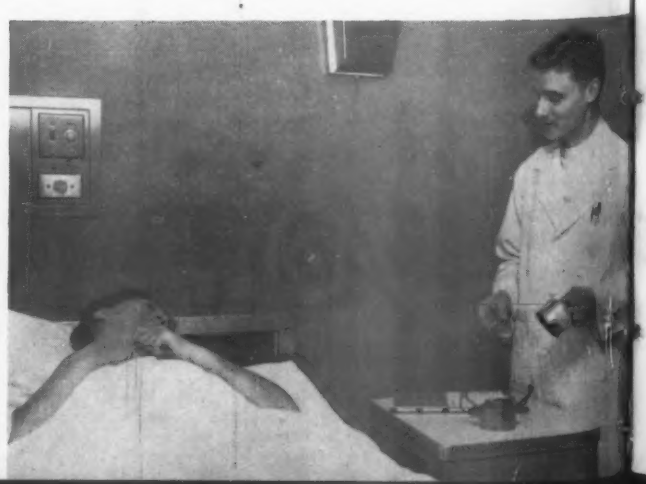
Part II — Handling and Dispensing of Radioisotopes

VI. Health Physics of Radioisotopes
   - A. Effect of human exposure to ionizing radiation
   - B. Dosage units
   - C. Maximum permissible exposures
   - D. Control of hazards of exposure
      1. External
      2. Internal
      3. Monitoring devices
   - E. Personnel safety considerations

VII. Storage and Handling of Radioisotopes
   - A. Storage for radioactive material
      1. Principles underlying shielding
      2. Shielding thickness requirements
      3. Storage of drugs, excretions, waste
   - B. Handling of radioactive material
      1. Handling hazards
      2. General principles of proper handling
      3. Handling devices



6 *Assays are frequently done to determine the activity of a sample by using an electroscope which is placed at a measured distance from the radioactive material. Time, distance, and rate of discharge of the electroscope are factors pertinent to determining activity of the sample.*



7 *Radioactive medication is delivered to the patient by the pharmacist. Both inpatients and outpatients receive such material. If being given to an outpatient, it is taken to a specific examining room where the pharmacist or physician supervises the patient while he drinks the medication. At right, pharmacist describes procedure to patient and answers patient's questions.*

VIII. Mathematics of Dosage and Dosimetry
- A. Dosage
  - 1. Permissible dose
  - 2. Safe tracer dose
  - 3. Differential absorption ratio
- B. Concentration
  - 1. Specific activity
  - 2. Radioactive decay corrections
- C. Dosimetry
  - 1. General considerations
  - 2. Beta particle emitters
  - 3. Positron emitters
  - 4. Gamma ray emitters
  - 5. Effective half-life

IX. Dosage Forms of Radioisotopes
- A. Dosage forms
- B. Methods of administration

X. Disposal of Waste Containing Radioisotopes
- A. General recommendations
- B. Water and air dilutions
- C. Reconcentration by chemical and biological agents
- D. Isotope dilution
- E. Burial grounds

XI. Radioisotopes for Clinical Investigation, Diagnosis, and Therapy
- A. Chemical forms available
- B. General applications

Part III — Radioisotopes in Hospital Pharmacy

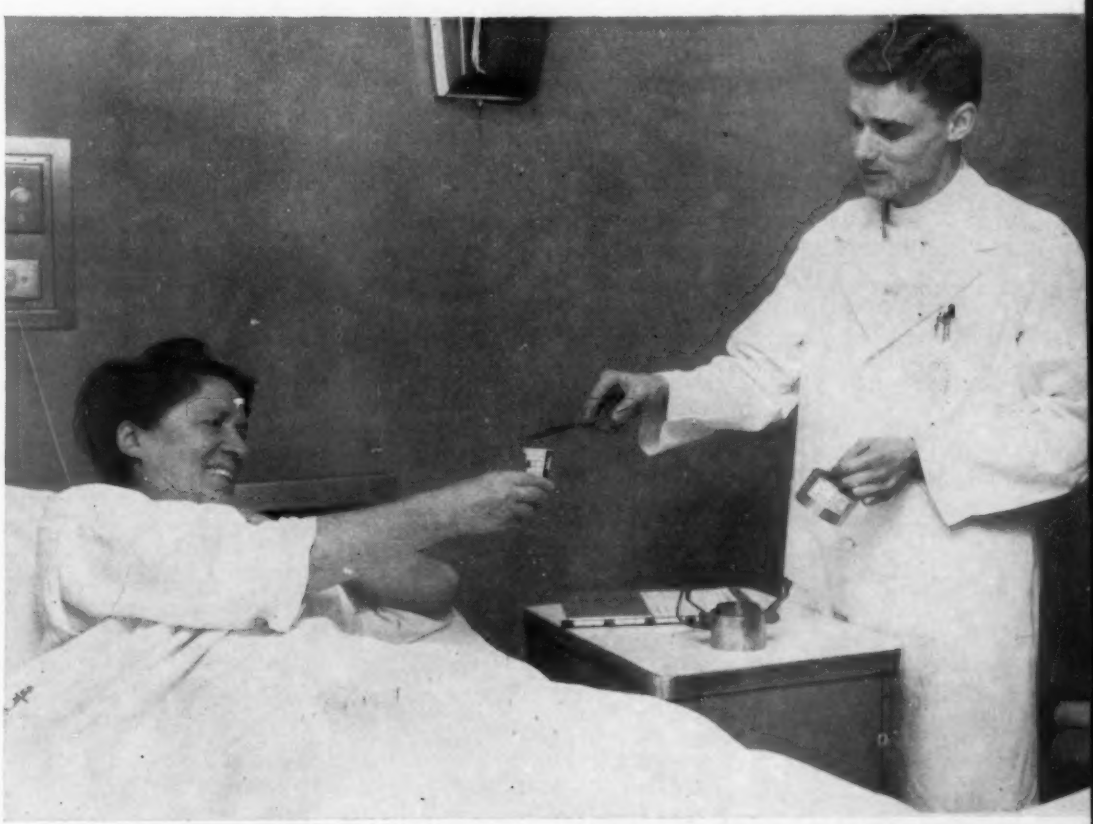
XII. Laboratory Design
- A. General building and construction
- B. Location with respect to other hospital facilities
- C. Surfaces and finishes
- D. Hoods and ventilation
- E. Shielding and waste disposal
- F. Equipment requirements
- G. Cost

XIII. Pharmacist's Role in Today's Nuclear Energy Age
- A. Dispensing of radioactive pharmaceuticals as an integral part of pharmacy techniques
- B. Pharmacist's knowledge should encompass:
  - 1. Mass decontamination
  - 2. Drugs used in radiation sickness therapy
  - 3. Contamination prevention
- C. Application of radioactive isotopes in pharmaceutical manipulations
  - 1. Sterilization by radiation
  - 2. Research tools

The design of a laboratory and an equipment list has not been completed. There is, however, considerable information in two of the references cited in the bibliography to provide a good start in the right direction. The American Hospital Association has a Committee on the Use of Radioisotopes in Hospitals which has accumulated considerable information particularly on the construction of laboratories.

Recommendations

Despite the meager accomplishments of our group during the past year, the Committee on



8 *Patient drinks radioactive material. Tongs are used by the pharmacist because he handles the material frequently and must take every precaution to prevent coming into contact with the material. He wears a dosimeter in his coat pocket which shows the amount of exposure he receives. Film badges (not shown) are also worn by employees and developed weekly to show exposure of personnel. Pharmacist participates in administering procedure only to lessen the number of personnel handling the material.*

Isotopes wishes to make the following recommendations at this time:

1. It is recommended that the radioactive medications in institutions be procured and dispensed by the Pharmacy Department; and that the pharmacist be responsible to the Committee on Isotopes for the institution through the Administrator or the Medical Director of that institution. It is further recommended that either a radiologist or physicist be appointed as a consultant to the technical operation of the isotope section of the Pharmacy, particularly in setting up the original techniques and on any changes concerning storage or handling.

2. It is recommended that the SOCIETY work with the Atomic Energy Commission Isotopes Division, the Radiological Health Service and the American Association of Colleges of Pharmacy to further develop and fully approve the proposed outline for a course in isotope pharmacy.

3. It is recommended that the SOCIETY work with the American Association of Colleges of Pharmacy to explore the possibility of offering a course in isotope pharmacy on a regional basis, thereby making it available to the largest number of pharmacists possible.

4. It is recommended that the American Hospital Association Committee on the Use of Isotopes be informed of the aims of the SOCIETY with regard to a radioactive isotope program in the hospital.

I wish to express my sincere appreciation to the members of the Committee and to those indirectly responsible for making this report possible.

ACKNOWLEDGEMENTS

PAUL PARKER is Chief Pharmacist at the University of Chicago Clinics where the photos were taken and LARRY SUMMERS is the Staff Pharmacist in charge of the Radioisotope Laboratory. Mr. Summers is the pharmacist shown in the accompanying photographs.

BIBLIOGRAPHY

1. Aebersold, P. C.: Production and Availability of Radioisotopes, Isotopes Division, U. S. Atomic Energy Commission, Oak Ridge, Tenn.

2. Bertram, V. A.: The Clinical Use of Radioactive Isotopes, Low-Beer, Charles C. Thomas, 1950.

3. Christian, John E.: Radioactive Isotopes in Hospital Pharmacies, *Bull. Am. Soc. Hosp. Pharm. 7*:178 (July-Aug.) 1950.

4. Concepts of Radiological Health, *Bulletin*, U. S. Department of Health, Education, and Welfare, Jan. 1954.

5. Cook, G. B. and Duncan, J. F.: Modern Radiochemical Practice, Oxford University Press, 1952.

6. Durham, Congressman Carl T.: Atomic Energy As Related to Medicine, Convention Address, *Journal National Association of Retail Druggists*, Dec. 20, 1954.

7. Emergency Exposures to Nuclear Radiation, Civil Defense Technical Bulletin TB 11-1, March 1952.

8. Evans, R. D.: Radioactivity Units and Standards, *Nucleonics 1*:32-43 (Oct.) 1947.

9. Glossary of Terms Used in Atomic Energy and Nuclear Physics, Council on Physical Medicine, American Medical Association.

9 *The physician by this time has signed a prescription and the label is placed permanently in the patient's chart.*

10 ***All disposable material is placed in special waste containers and ultimately burned. Other contaminated materials are stored in lead vaults until the radioactivity becomes negligible. Lead vaults for storage of such material are shown above.***

11 ▶

At the completion of the operation the area is surveyed to detect any amount of contamination in the laboratory. The Health Physics Department makes a complete weekly survey of the Pharmacy Laboratory. The amount of radiation in all areas of the laboratory is recorded on a "map" and forwarded to the Chief Pharmacist. The report also describes cleanliness of laboratory; disposal of waste; and recommendations or explanations of discrepancies. A member of the Radiology Staff serves as a consultant to the Pharmacy concerning every procedure carried on in the Isotope Pharmacy.

10. Hahn, Paul F.: A Manual of Artificial Radioisotopes Therapy, Academic Press, Inc. 1951.

11. Hawkins, M. B.: The Design of Laboratories for the Safe Handling of Radioisotopes, Isotopes Division Circular B-5, U. S. Atomic Energy Commission.

12. Henriques, F. C.: Administration and Operation of a Radiochemical Laboratory, *Nucleonics 2*:1-15, 1948.

13. Hutchinson, G. B.: Some Aspects of Radioisotope Therapy of Interest to Pharmacists, *J. Am. Pharm. Assoc., Pract. Pharm. Ed. 15*:360 (June) 1954.

14. Ingraham, S. C. and Taylor, W. R.: Radioisotope Facilities in the General Hospital, *Hospitals 26*:74 (Dec.) 1952.

15. Isotopes, Atomic Energy Commission, 1949, 5000-A7301.

16. Kamen, Martin D.: Radioactive Tracers in Biology, Academic Press, Inc. 1951.

17. Libby, W. F.: Measurement of Radioactive Tracers, *Anal. Chem. 19*:2-6 (Jan.) 1947.

18. Morgan, G. W.: Facilities and Equipment for Isotopes Program, *Hospitals 29*:103 (Mar.) 1955.

19. Morgan, G. W.: Protective Precautions in the Handling of Radioactive Materials, *Science Educ. 32*:2, 1948.

20. Morgan, G. W.: Some Practical Considerations in Radiation Shielding, Isotopes Division Circular B-4, November 1948, U. S. Atomic Energy Commission, Oak Ridge, Tenn.

21. Morgan, G. W.: Surveying and Monitoring of Radiation from Isotopes, *Nucleonics 4*:24-37, 1949.

22. Organization and Management of a Radioactive Isotope Laboratory in a General Hospital, Hospital Administration Review, Northwestern Univ. *7*:17 (Sept.) 1954.

23. Quimby, E. and Braestrup, C. B.: Planning the Radioisotope Program in the Hospital, *Am. J. Roentgenol. & Radium Therapy 63*:6 (Jan.) 1950.

24. Radio Elements and Accessories, Catalog C, Atomic Energy of Canada, Ltd., Commercial Products Division, P.O. Box 93, Ottawa, Canada.

25. Radioisotopes, Their Meaning to Pharmacy and Medicine, *Modern Pharmacy 33*:5 (Nov.) 1948.

26. Rules and Procedures Concerning Radioactive Substances and Associated Hazards, Bulletin, Clinton Lab., U. S. Atomic Energy Commission, Feb. 14, 1947.

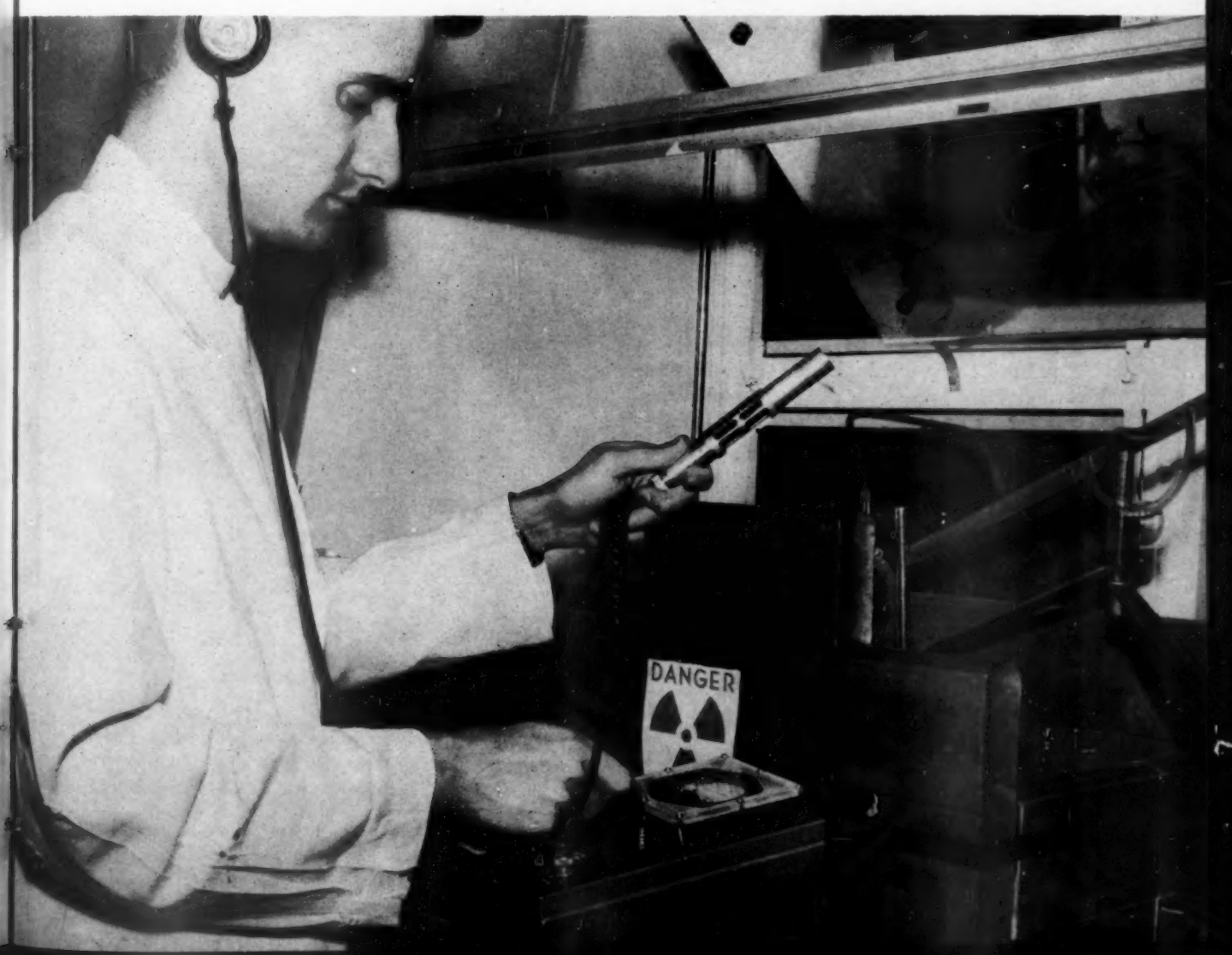
27. Safe Handling of Radioactive Isotopes, Handbook 42, U. S. Department of Commerce, National Bureau of Standards.

28. Sheppard, C. W. and Hahn, P. F.: Techniques in the Handling of Radioactive Isotopes Used in Medical Therapy and the Preparation of Radioactive Colloidal Gold, Isotopes Division Circular A-3, U. S. Atomic Energy Commission.

29. Tabern, D. L., Taylor, J. D., and Gleason, G. I.: Radioisotopes in Pharmaceutical and Medical Studies I, *Nucleonics 7*:5, 1950.

30. Tompkins, E. R.: Equipment for Radiochemical Operations, Isotopes Division Circular A-6, June 1948, U. S. Atomic Energy Commission, Oak Ridge, Tenn.

31. Tompkins, E. R.: Methods of Separating and Purifying Radioisotopes, Isotopes Division Circular C-11, U. S. Atomic Energy Commission.



a simplified method for efficient pharmacy service

by Edward Superstine

THE DISPENSING PHASE of hospital pharmacy operation occupies the major share of time for all personnel in the pharmacy. Through the initiation of a system of prepackaging for anticipated dispensing needs there can be realized a significant saving of time. The time to be saved is primarily registered pharmacist's time. Such a saving would permit the pharmacy department to concentrate on work areas which have been somewhat neglected because of lack of time. I am thinking specifically of the better job that most of us could do with such things as: increasing the importance of the role of the pharmacist as a consultant; spending more time on research activities and formulation; increasing the educational services of our departments by helping to instruct nurses, interns, and physicians in those phases of their work which can best be done by a practicing pharmacist. The question now becomes, how can we set up a prepackaging program to satisfy our own specific needs?

The first step would logically be to make a careful survey, for at least one month, to determine just what items are most frequently ordered from the pharmacy. For convenience, your survey should embrace three order groups: 1. Request for "no charge" or "ward stock" items; 2. Requests for inpatient charge drugs; and 3. Requests for outpatient prescriptions. Prepackaging can easily be applied to all these phases of dispensing. Completion of your study will give you the answer not only to which items shall be prepackaged but will also relate the amount of prepackaged stock that can be dispensed in thirty days.

Inpatient Aspects of Prepackaging

Whether your hospital is one which practices the policy of an all inclusive rate (*i.e.* no charge to the patient unless the medications are of a special nature), or the more widely accepted pol-

EDWARD SUPERSTINE, formerly Assistant Chief Pharmacist at Duke Hospital, Durham, N.C., is now with the West Disinfecting Company, Long Island City, New York.

Presented at the Fall Meeting of the Southeastern Society of Hospital Pharmacists, Durham, N. C., Oct. 23, 1954.

icy of individual charges for most medications excepting those that are unusually reasonable, there is a definite need for a prepackaging system of some sort. I feel certain that most of us will agree that in a general hospital of any size there is an advantage to having such supplies as mouth lotion, back rubbing compound, mineral oil, aspirin tablets, multiple vitamins, and as many as perhaps one hundred inpatient medication needs ready, labeled, and in other ways suitable for immediate dispensing. If these items are left to be prepared only when called for, one readily recognizes the amount of extra time that would necessarily be involved in individual labeling and pouring or counting.

Hand in hand with this program of prepackaging in the hospital pharmacy an easily adaptable requisition system may be conveniently used, especially for no charge or ward stock medications. After determining the items that are to be dispensed as prepackaged stock, we can easily prepare a printed requisition form which can be used for many months without revision. With a printed type requisition the nurse need only fill in the number of packages of a particular item that she is ordering. When the requisition is received by the pharmacy, it is filled through the use of prepackaged stock and checked off in the appropriate place. There need be no place on the requisition for pricing since the price of each specific package is the same and predetermined. Monthly tabulation becomes much more efficient and consists only of totaling the number of units of each item on one requisition that went to each nursing station, then multiplying by the unit price to determine total cost.

Physical Layout

The physical layout of the pharmacy for filling no charge inpatient medications should be conducive to a free-flowing operation involving a minimum of foot-work. The area for the storage of inpatient prepackaged items should be arranged to accomodate all of the drug baskets or clinic trays when they are sent to the pharmacy for stocking. A convenient method of operation is centered about the use of a long work table thirty inches high and two feet in width with an abundance of open shelving just above the working area and adjacent to the table itself. The bottom of this fixture should also contain open shelving appropriate for the storage of both quart and one gallon size bottles. Through the use of a table with these specifications and the arrangement of stock according to frequency of use, or alphabetically, the filling operation is accomplished in very little time with little effort and few unnecessary steps. Not only does a proper physical setup save time but it also gives a much neater general appearance to the pharmacy. Certainly in any remodeling plans adequate thought should be given to a physical layout that permits a smooth running procedure for the filling of ward and clinic trays. A suggested arrangement for convenient open shelving is shown in Figure 3.

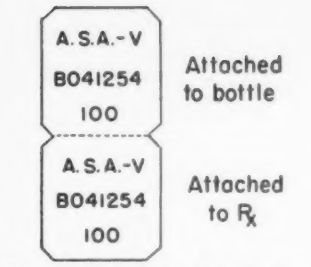
Nonprofessional Personnel

Of late there has been much written and still more said regarding the pros and cons of utilizing nonprofessional personnel in some of the operations of the hospital pharmacy. It is my opinion that these people do have a very definite place in today's operation of a hospital pharmacy. More specifically, I feel that properly oriented and adequately supervised nonprofessional people can do much in the way of saving time for the busy hospital pharmacist. The filling job just described for instance, may be easily and safely handled by nonprofessional personnel. The person filling the trays need only read the requisition and place the respective container into the tray. All containers handled by this person have been previously labeled and there is no actual handling of any unlabeled material. The worse error that could possibly occur at this phase would be the receipt of an uncalled for drug, having its proper label, however. The most important item to stress, in my opinion, is the need for sound initial training and orientation which impresses upon the person the nature and importance of his work. If this is properly followed through with consistent original checking and with a work scheme centered about sustained supervision we can be certain of obtaining good results with nonprofessional personnel.

Institutions that supply many medications on a charge basis can also utilize a prepackaging system to good advantage. In most instances these charge items can be handled in a way similar to the filling of outpatient prescriptions; however, satisfactory provision must be made for the posting of charges to the patient's account. Duplicate prescriptions or "charge slips" can be satisfactorily used.

Outpatient Aspects of Prepackaging

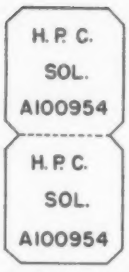
In the filling of outpatient prescriptions it is necessary to consider that the same drug may be packaged in several different size containers. Tablets can be prepackaged in numbers of fifty, one hundred, or other convenient counts as the physician's prescription dictates. In cases where the drug quantity does not meet with the prescription order, stock bottles can be conveniently located in the immediate dispensing area to fulfill these needs. This same procedure holds true for liquids which can be packaged in four ounce, eight ounce, and



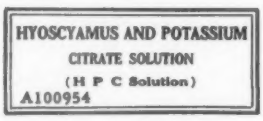
For Outpatients Dispensing

For Inpatients

1



For Outpatients Dispensing



For Inpatients

2

1 and 2 show examples of labels for inpatients and for outpatients. In addition to the tab label illustrated, an additional prescription label would be attached to the container for outpatients

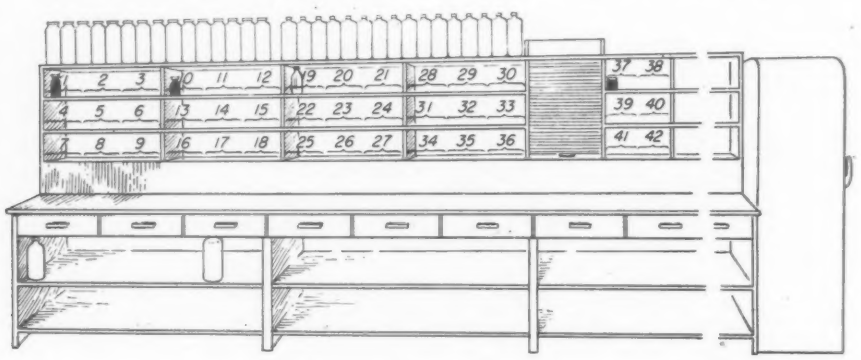
one pint bottles, etc. Here again it should be remembered that stock bottles should be kept on hand to take care of the unusual or odd quantity. It is also advisable that a formulary or other printed medium be available to let the physician know in what amounts the various preparations are packaged so that his orders can be written accordingly. This is not to say that the doctor must write for fifty or one hundred tablets when he wants the patient to have less since these odd orders can also be taken care of as described. It does, however, permit the pharmacy to have ready in anticipation of the doctor's prescription those amounts that are usually prescribed.

Identification

Both the outpatient and inpatient charge drugs must be adequately identified to insure that no error is made when selecting the container. The identification tag for these medications can be small in size and may contain only five or six letters and numbers which become standard abbreviations. For example, Hyoscyamus and Potassium Citrate Solution DHF (our bladder mixture) may be abbreviated as "H P C SOL", or aspirin tablets 0.3 Gm might be "A S A -V", in this way all of the packages become separate and specific substances with a minimum possibility for error if the label is carefully read. If an additional safety measure is desired, two of these identification stickers may be placed on each bottle, one of them to be removed and attached to the prescription and filed, and the other to remain on the bottle. In this way there is a permanent record which can be easily found in order to see exactly what was given at the time of dispensing. Examples of labels for inpatient and for outpatient dispensing are shown in Figure 1 and Figure 2.

A good physical layout is also important in the outpatient dispensary, which may also serve as

3 Suggested arrangement for convenient open shelving



1. Aspirin (acetylsalicylic acid) 0.3 GM.
2. A.S.A. Compound
3. Ammonium Chloride E.C. 0.5 GM.
4. Cascara Sagrada Ext.
5. Isoniazid 50 MG.
6. Sodium Bicarbonate 0.3 gm.
7. Sulfadiazine 0.5 gm.
8. Sulfisoxazole 0.5 gm.
9. Ferrous Sulfate 0.3 gm.
10. Chloral Hydrate 0.5 gm.
11 - 18 Misce.
19. Aluminum Hydroxide Gel
20. Elixir Terpin Hydrate with Codeine
21. Chloral Hydrate Solution 10%
22. Collodion Flexible
23. Magnesia Magma
24. Opium Tincture Camphorated
25 - 27 Misce.
28 - 32 External Liquids (lotions)
33 - 36 Bulk Powder
37 - 42 Ointments

the area that fills inpatient medications of the charge variety, if this is convenient. Through the use of well placed open shelving, drawers, and Schwartz-type cabinets one can be assured of having the fastest moving items at hand. Through the use of prepackaging in the outpatient dispensary we can be certain that the waiting clinic patient shall have rapid and efficient service.

Prepackaging Operation

It is apparent from what has been said that the procedure for prepackaging medications must be rigidly controlled and supervised. An error at this stage could be very extensive and every precaution must be taken to see that we have an error-free operation.

Mass filling of bottles should not be undertaken by a sole individual without adequate supervision. A *well trained and properly oriented* nonprofessional person can do an excellent labeling and filling job if he has close supervision. His stock containers should be given to him and all packaging records should be kept by a registered pharmacist. These records should contain the following information: 1. Date of prepackaging; 2. item packaged; 3. total units packed; 4. complete disposition of packaged material (whether for in-or outpatients); 5. size and type container; 6. who did the actual packaging and labeling; 7. by whom was it checked. 8. the original package control number and firm name; 9. your control number; and finally 10. the cost of each packaged item unit should be determined based upon materials and labor. The registered pharmacist is to be responsible for giving the proper labels to the nonprofessional person. He should make two subsequent checks in order to make certain that everything is in order, once during the labeling operation and a second time after the job is completed.

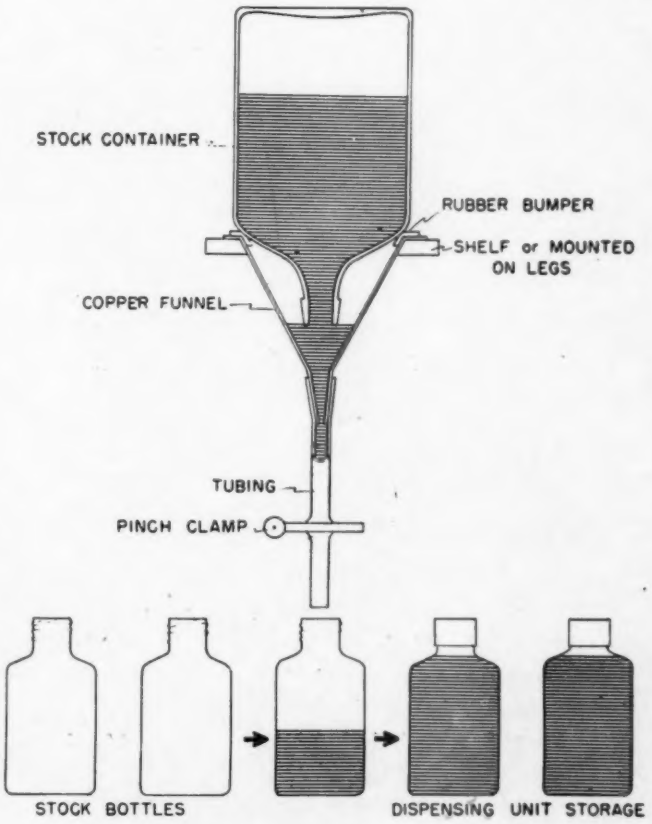
In order to make the best possible use of your prepackaging program, stocks for both in-and outpatients should be prepared for at least a ninety day period. Most purchased tablets are best handled by prepackaging as soon as they are received. These are to be stocked in a reserve storage area and as soon as this stock has been completely removed to active storage a new purchase order should be initiated. In this manner we can keep to a minimum the amount of storage space needed for a properly functioning prepackaging program. Liquids, of course, can be handled in the same manner whether purchased or products of the hospital bulk compounding program.

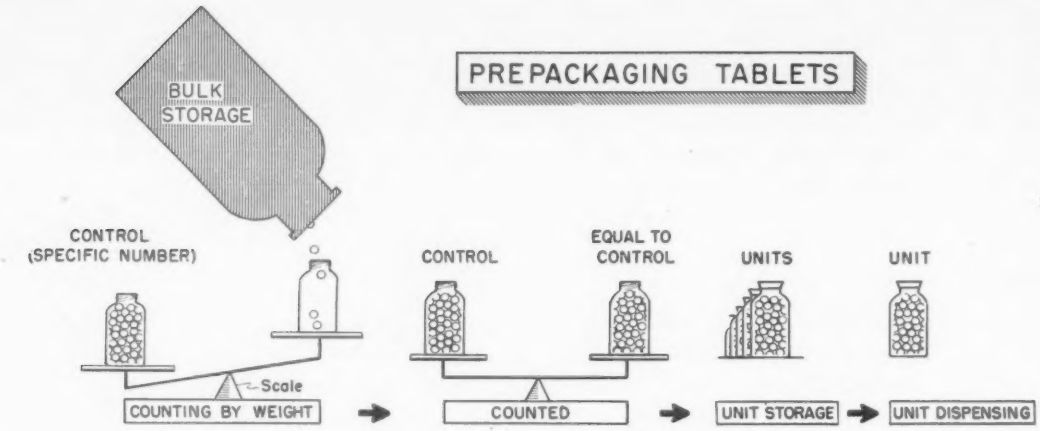
Control numbers should be attached to all prepackaged units. These numbers should be arranged so that there is no difficulty in refering to the prepackaging record to find any necessary information. Outpatient identity labels can be made very nicely through the use of either a hand or motor driven printer, some models selling for as little as $75.00. Blank labels can be purchased with the hospital name and the label itself can be prepared to bear the product name, the size of the unit, and also the control number. Some may prefer not to use control numbers for most inpatient medications of the ward stock variety. This would, of course, obviate the necessity of changing labels each time that the bottle was returned for a refill, merely for the sake of the control number. However, if the number is desired it could be easily removed or attached through the use of "touch sensitive" labels which are commercially available.

Bulk liquids for prepackaging may be efficiently handled through the use of simple gravity flow from one or five gallon stock containers. A bottle filling device of this type, as shown in Figure 4, can easily be constructed by your maintenance department. There are several commercially available fillers if your operation is sufficiently large.

The counting of tablets may be done with ease by weighing if quantities are at least in the hundreds and if the tablet or capsule is of moderate

4 Bottle filling device for prepackaging of bulk liquids





5 Prepackaging of tablets by weighing

size (Figure 5). The more expensive materials such as the antibiotics, however, are best done by individual counting. A certain degree of accuracy can also be attained by eye, using the two to twelve dram vials; however, this procedure is only recommended in the case of highly economical drugs such as aspirin tablets or perhaps ferrous sulfate. When vials prove to be inadequate in size a very eye-pleasing package can be had by using the clear glass french square wide mouth bottles ranging in size from one ounce to a quart.

If you plan a very large tablet and capsule prepackaging operation you may prefer to invest some of your hospital's money in a "Rotax" tablet and capsule counting machine. The following was ascertained under actual operating conditions of a "Rotax", Model 'S', at Lenox Hill Hospital, New York City.*

1. Ninety-five percent of all tablets and capsules were adaptable for use. Exceptions were: Premarin, Dexedrine, Benzedrine, and elliptical buccal tablets.

2. Packaging operations by hand, that formerly took 15 hours, are done in two to two and one-half hours.

3. Costs of packaging, by hand, are reduced from $20 to $5.

4. Average time to readjust "Rotax" for new operation is eight minutes.

5. Average time to dismantle, clean, and reassemble is 15 minutes.

6. Accuracy in counting is absolute.

For inpatient medication, containers for standard ward stock may be reused and at most need only a slight washing as would be the case with milk of magnesia bottles. A label laquer is used to great advantage and, when properly applied in two or three coats, does much to extend the life of a label. Uniformity in bottling and labeling does much to improve the appearance of the pharmacy and consequently the appearance of the drug cabinets at the nursing stations on the wards and in the clinics. Neatness in this respect should always be stressed since this can be one of the best good public relation sellers for the Pharmacy.

In conclusion I should like to say that I firmly believe that a prepackaging program can save time. Time that all of us can use and put to good use. Once a system of this type is established in both the outpatient dispensary and in the filling of inpatient orders, the pharmacy will become a more efficient service department in the dispensing phase of its operation.

*The Rotax counting and packaging machine is distributed by The Burnet Company, 100 Gold St., New York City 38.

Typical Production Output Using Rotax Machine

Tablets or Capsules	Output Quantity	No. of Tabs. Pkgd./Unit	Bottles Filled	Time
Dextroamphetamine Tabs. 5 mg.	25,000	25	1,000	1 hr. 18 min.
Aspirin Tabs. 0.3 Gm.	100,000	100	1,000	4 hr. 50 min.
Dilantin Sodium Caps. 0.1 Gm.	25,000	100	250	2 hr.
Pronestyl Caps. 0.25 Gm.	5,000	25	200	20 min.
Cascara Sagrada Tabs. 0.3 Gm.	10,000	100	100	15 min.
Trasentine Tabs. 75 mg.	25,000	25	1,000	1 hr. 26 min.
Papaverine Tabs. 0.1 Gm.	5,000	25	200	18 min.

American Society of Hospital Pharmacists
Miami Beach Meeting
May 1-3, 1955

1955 OFFICIAL REPORTS

Table of Contents

Meetings and Officers

AMERICAN SOCIETY OF HOSPITAL PHARMACISTS

	*President**	*Vice-President**	*Secretary*	*Treasurer*
1942 Denver, Colo. August 17, 1942	Organizational Meeting - Officers of Subsection Presided ASHP Officers elected to serve 1942-1943			
1942-43 Columbus, Ohio Sept. 1943	H.A.K. Whitney	Donald A. Clarke	Hazel Landeen	Sister Ludmilla
1943-44 Cleveland, Ohio Sept. 1944	Don E. Francke	Hazel Landeen	I. T. Reamer	Sister Mary John
1944-45 No meeting	Don E. Francke	Vacant	I. T. Reamer	Sister Mary John
1945-46 Pittsburgh, Pa. Aug. 1946	Don E. Francke	Anna D. Thiel	I. T. Reamer	Sister Mary John
1946-47 Milwaukee, Wis. Aug. 1947	Hans S. Hansen	Jennie Banning	Walter Frazier	Sister Gladys Robinson
1947-48 San Francisco, Calif. Aug. 9-10, 1948	John J. Zugich	Margaret Gary	Leo Godley	Sister Mary Etheldreda
1948-49 Jacksonville, Fla. Apr. 25-26, 1949	W. Arthur Purdum	Geraldine Stockert	J. R. Cathcart	Sister Jeanne Marie
1949-50 Atlantic City, N.J. May 1-2, 1950	Herbert L. Flack	W. Paul Briggs	Gloria Niemeyer	Sister M. Junilla
1950-51 Buffalo, N. Y. Aug. 27-28, 1951	I. T. Reamer	Grover C. Bowles	Gloria Niemeyer	Sister M. Jeanette
1951-52 Philadelphia, Pa. Aug. 21-22, 1952	Walter Frazier	Jane Rogan	Gloria Niemeyer	Sister Mary Raphael
1952-53 Salt Lake City, Utah Aug. 16-18, 1953	Grover C. Bowles	George Phillips	Gloria Niemeyer	Sister Mary Florentine
1953-54 Boston, Mass. Aug. 22-24, 1954	Allen V. R. Beck	Adela Schneider	Gloria Niemeyer	Anna Thiel
1954-55 Miami Beach, Fla. May 1-3, 1955	George F. Archambault	Claude Busick	Gloria Niemeyer	Sister Mary Berenice

*Chairman and Vice-Chairman from 1942 to 1947.

American Society of Hospital Pharmacists

PROCEEDINGS 1954-55

1 REPORTS OF OFFICERS AND COMMITTEES

Address of the President

GEORGE F. ARCHAMBAULT

It is traditional for the president of your SOCIETY, at the close of his term of office, to present a sort of a "How went the year" report—an account dealing with the progress of the SOCIETY during his tenure of office. This, he usually does by reporting on his personal activities and observations and by summarizing the problems and the activities of hospital pharmacy and the SOCIETY. He intersperses his report with such recommendations as he believes are necessary or desirable for the good of hospital pharmacy and the ASHP. I shall now attempt to render an account of my stewardship to you in this traditional manner.

First, I wish to state I am grateful, more grateful really than words can express, for the honor of serving as president of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS this past year. It has been a year of revelation to me—revelation as to the great amount of good which has been accomplished by the SOCIETY in bettering pharmaceutical service in the hospitals of the Nation; revelation as to the vigorous planning now underway to do an even better job in the future; and revelation of the importance of this SOCIETY to the modern hospital in general at mid-20th century.

President's Activities

I have, during the year, through the medium of the President's Page in THE BULLETIN, kept you informed of much of the personal activities of your president. At this time, a brief summary of these activities appears to be in order. Including the travel to the Convention in Boston last August, I have logged some 25,241 miles on SOCIETY business. As your president, I addressed nine local chapters; two Regional Chapters; two combination local ASHP Chapters and A.Ph.A. Branch meetings; the student bodies at nine Accredited Schools of Pharmacy; one Tri-State Hospital Association meeting and four miscellaneous groups; the Winthrop-Sterling Research Seminar, the Association of Military Surgeons, the A.H.A.'s Institute on Hospital Law and the Pharmacy Section at the annual Convention of the American Association for the Advancement of Science. In all, 26 talks. Further, it was the privilege of this president to represent you at eight other meetings; at the meetings of your Executive Committee; at the special meeting called in connection with the Committee to Study the Role of Pharmacists in Small Hospitals; at Institute Planning meetings in St. Louis and Chicago with the Catholic Hospital Association and the American Hospital Association; at the Policy Committee meeting of the Division; and at a meeting of the Joint Committee of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS and the American Hospital Association in Chicago. In all, a total of 34 gatherings. Had I been able to accept all of the invitations which came to me as your president, this impressive listing would have been much larger.

In traveling those 25,000 plus miles, I met at "home plate" many of our members and participated a little in the activities of their "locals," thus obtaining a revealing "cross section" of our membership and our professional speciality, hospital pharmacy, at work. Hospital pharmacy is truly "on the March." In Texas; in the Southwest; in the New England States; in the far Northwest; in the heartland of the country; and here in the South, everywhere I have found the self same thing—*a keen and devoted dedication to hospital pharmacy.* Further, as the year coursed along and we worked with other groups concerned

with the hospitalized of the nation—notably the Catholic Hospital Association and the American Hospital Association, I sensed with pride, the esteem in which these groups hold our professional speciality, hospital pharmacy; and their respect for our SOCIETY and its principles and objectives. Each of us may well be proud of our national SOCIETY, its 45 local chapters and the grand work that our total membership is doing for the betterment of pharmaceutical service in hospitals and clinics.

Hospital pharmacists as a group remind me of a story told by Benjamin J. Fairless, Chairman of the Board of United States Steel. A Swedish prospector went out to California and struck it rich. Every time he disappeared into the hills he came up with a new vein of ore bigger and better than the last. His envious companions tried desperately to learn his secret. Finally, one day, he broke down and told them how he did it! "Boys," he said, "I yoost keep digging holes." And that's how it is with hospital pharmacists, year in and year out, you folks "yoost keep digging" and digging, at the same time building and building hospital pharmacy practice into better and better service for the sick and the injured of the nation.

Society Matters—National

Last August in Boston, as your president-elect, I repeated President Grover Bowles' suggestion, that we should give serious consideration to incorporating the SOCIETY. I also mentioned the need for bonding all individuals involved with the handling of SOCIETY or BULLETIN monies. I am pleased to report to you today—missions accomplished.

Incorporation: Your SOCIETY became a body incorporate, a legal entity in the District of Columbia, at 2 p.m., March 10th last. Past-President Grover Bowles, Secretary Gloria Niemeyer, and your president, signed the "Articles of Incorporation" in the Conference Room of the Institute of Pharmacy Building on historic Constitution Avenue in Washington, D. C., at 4:30 p.m. March 9th last.

Bonding: Our parent organization, the American Pharmaceutical Association, this past year bonded its employees, obtaining a primary commercial blanket bond covering losses to the extent of $50,000. Through our fortunate affiliation with the A.Ph.A., in the Division of Hospital Pharmacy of the A.Ph.A. and ASHP, our paid employees were included by rider in this contract without cost to the SOCIETY. Here again is further tangible evidence of the soundness of our affiliation with pharmacy's over-all national organization, the American Pharmaceutical Association.

Other Matters—National Society

During this past year, serving as your president and on deck in Washington, I have had an excellent opportunity to scan the internal workings of our SOCIETY. We can all be proud of its management. Further, the auditors had nothing but praise for the manner in which the affairs of the BULLETIN and the SOCIETY are conducted. I do have, at this time, a few suggestions that I wish to lay before you in connection with the operation of the SOCIETY, suggestions that I hope this group will consider and request action on by the Executive Committee. One item, in my opinion, would give still further protection to the SOCIETY and in particular to the officers involved in the conduct of its day-to-day business activities. The other items are beamed at making the SOCIETY more representative of all its members, now that it is truly national in character, scope and membership.

1. *Disbursements*: Our treasurer has suggested and your secretary concurs, that it would be wise for all checks issued by the SOCIETY to be signed by two officers rather than by just the treasurer. It has been suggested that one of the co-signers be the secretary and in those instances where the secretary or treasurer is unavailable, that the president be empowered to sign. In the case of BULLETIN activities, a somewhat similar arrangement *is in effect*, the By-Laws of the SOCIETY require that the Editor and the Secretary serve as co-signers. It would be wise to consider giving the president this power of co-signer also. He may then sign in the absence of either the editor or the secretary, thus preventing any interruption in the normal flow of the SOCIETY's business affairs. Your president recommends that these changes be adopted.

2. *Membership*: A sound indication of progress of any SOCIETY is its continuing ability to attract *new* members, as well as keep its old. You have heard during the course of this Convention the good news that 237 members joined the SOCIETY this past year. Also, that the number of affiliating locals has been increased by five. Nebraska; Southeast Florida; Iowa; Rhode Island; and Oregon have joined our ranks this past year. With our older 38 locals this gives us 43 active chapters as of this Convention. Further, I understand that a Virginia Chapter is now being organized and will request affiliation shortly. From the best statistics available we believe that the number of pharmacists engaged in hospital pharmacy practice in the United States is somewhere between 3,167 and 4,732. We must bear in mind that each year hospital pharmacy has its turnover of pharmacists as do the other specialities of pharmacy. Our goal must ever be the attracting of the new as well as more and more of those that elect to remain in hospital pharmacy as a life career. With a present membership of approximately 2,300, we have from 1,867 to 2,432 opportunities to gain new members in the years just ahead.

3. *Method of Electing Officers*: The time has now come, in my opinion, when the national SOCIETY should restudy Chapter One of its By-Laws as it concerns the power given to the president to appoint a committee of three members to nominate candidates for the principal offices of the SOCIETY. It is my considered opinion, that the membership of the SOCIETY is now *too large* for this form of approach to officer selection. A plan similar to that in effect by the American Pharmaceutical Association might well be considered. I refer to that part of the A.Ph.A. By-Laws (Chapter II, Article 1) that allows each active local branch to nominate one or more candidates for each office. From the list of such candidates, plus any, if named at the Convention, the nominating committee presents the slate of nominees for the offices for the coming year. Such a change in our By-Laws, would I believe, bring the local chapters into closer unity with the national SOCIETY *and offers a more democratic process* for the selection of national officers. I respectfully request that this proposal be referred to the Planning and Advisory Committee, and that *this* committee give an opinion on the advisability of this change to the Executive Committee at its mid-year meeting.

4. *Meeting of House of Delegates*: The By-Laws of the SOCIETY state that the House of Delegates shall meet at a time designated by the president of the SOCIETY, on the day preceding the first day of the Annual Meeting of the SOCIETY. At the discretion of the president, additional sessions of the House of Delegates may be called during the period of the Annual Meeting.

It would appear, considering the large volume of business that must now come before the House of Delegates, that the SOCIETY should give thought to the scheduling of two definite meetings of the House of Delegates each year. This suggestion I also refer to the Planning and Advisory Committee for their considered opinion.

5. *The ASHP-A.Ph.A. Recording*: Last Fall, the Division of Hospital Pharmacy of the A.Ph.A. and the ASHP arranged for a recording of messages from the president and the secretary of the SOCIETY and the secretary of the American Pharmaceutical Association. For the first time, your officers were able

to deliver *personalized messages, messages* dealing with SOCIETY plans and objectives, to the local chapters at the start of their fall meetings. Many chapters requested *annual repeat performances,* so I now recommend that the SOCIETY endorse the recording project and inform the Division of Hospital Pharmacy of its wishes as well as its appreciation of this fine service.

6. *The Planning and Advisory Committee*: This Committee, made up of the Past-Presidents, concerns itself with such long-range problems as the Executive Committee and the membership refers to it. The Committee reports to the Executive Committee through its chairman. Because of the importance of the activities of this Committee, I recommend that consideration be given to making it one of the standing committees of the SOCIETY and that it continue to be chaired by the immediate past-president who, under our present Constitution and By-Laws, is already a member of the Executive Committee.

Local Chapters

I would now like to address myself for a few moments to the subject of our local chapters and to the regional institutes and seminars. It has been my pleasure to attend, as I have mentioned, many meetings of the ASHP chapters this past year. I noted with surprise and with pleasure the growing popularity of local or regional institutes or seminars. It was my good fortune to attend three such institutes; one conducted by the Southeastern Society; the Seventh Annual Hospital Pharmacy Seminar conducted jointly by the Texas Society of Hospital Pharmacists and the School of Pharmacy of the University of Texas; and the Annual Seminar of the New England Council of Hospital Pharmacists. These programs are conducted either by the branches alone, or in cooperation with an Accredited School of Pharmacy or in connection with a regional hospital society or council meeting. These are splendid study meetings with which is combined at least one evening of excellent relaxation and good fellowship. I doubt if I ever shall forget the barbecue evening, Texas style, at this year's Seminar at Austin. I strongly urge that each local chapter consider conducting a seminar, either alone if its membership is large enough to support one, or jointly with two or more neighboring chapters. Such institutes are truly inspirational and do much to elevate the professional status of hospital pharmacy in the local areas. I also urge that each local or regional group work closely with its local hospital and State pharmaceutical associations. There are no better approaches to solving hospital pharmacy problems on the local level than through the annual joint meeting with regional hospital administrators and retail practitioners of pharmacy. For example, the New England group meets annually with the hospital administrators of the area at the annual meeting of the New England Hospital Council and our Arizona Chapter meets annually and has a part in the program of the Arizona State Pharmaceutical Association.

Goal—A Chapter in Every State

I have already referred to the continuing growth of the SOCIETY in terms of new members and in terms of new chapters. While we now have 43 active chapters, we must not lose sight of the fact that several states have more than one chapter and that regional chapters overlap states, leaving the SOCIETY still without a state chapter in over ten states. It is my hope that the SOCIETY will have one or more active chapters in each of the 48 states within the next few years. I urge you members in states without chapters to seriously consider the formation of a chapter in your state, in order that hospital pharmacy in every state may gain the greatest benefits from SOCIETY affiliation.

Major Activities of Past Year

I would like now to review with you briefly some of the major activities of your SOCIETY this past year. It is difficult to extract from the many events that transpired specific items for comment, but some are especially noteworthy. The committees deserve most of the credit for the progress of the SOCIETY this year. The leadership shown by the various chairmen is truly exemplary. Their reports you have heard yesterday and this morning. I can say little here to add to their accomplishments. Let me point out some of the major highlights and in some instances, the completion or near completion of projects that have been several years in the making:

1. *Accreditation Pharmacy Standards for All Hospitals*: A list of objective questions and standards was developed at the January meeting of the Joint Committee of the ASHP and American Hospital Association as guides for the inspection of a hospital pharmacy department by accreditation surveyors. We expect this list will be approved by the American Hospital Association and forwarded to the Joint Commission on Accreditation of Hospitals for use in the accreditation inspection of hospitals of *all sizes,* large and small. We expect also, because of this approach to see pharmacy move soon from the "contingent" to the "required" section of the standards for hospital accreditation. Developed along the lines of our Minimum Standard, this material is applicable to all hospitals seeking accreditation, regardless of size, a feature lacking in our Minimum Standards.

2. *Manual of Hospital Pharmacy Practice*: The tentative outline for the Manual on Hospital Pharmacy Practice was reviewed and revised. Both the A.H.A. and the ASHP as individual organizations voted to approve the proposal to apply for a $27,000 grant for writing the proposed Manual. Further, the American Hospital Association stated in its report that the Manual "should provide basic information useful to every hospital in the United States and elsewhere, to every health department, to the Federal Medical Services, to the commercial field in pharmacy, to the retail outlets in pharmacy, to enable all to render better pharmaceutical service to the sick and injured in hospitals, clinics, diagnostic centers and other health institutions.

"Standards for Pharmaceutical practices in hospitals will be established that should be of great benefit to hospital administrators, clinical directors, and dentists, hospital trustees, physicians and hospital pharmacists."

In these comments of the American Hospital Association, we concur, and we look forward to seeing this Manual become a reality within the next few years.

Pharmacy Services in All Size Hospitals

This study has been proposed by the Committee to Study the Role of Pharmacists in Small Hospitals, and has the approval of the SOCIETY. This survey will determine operational performance on the basis of the Minimum Standards. The Policy Committee of the Division of Hospital Pharmacy of the A.Ph.A. and the ASHP revised and approved the project this February and returned the revised report to Dr. John McGibony of the School of Public Health at the University of Pittsburgh. He will explore the possibility of obtaining a grant to implement the study. Here again, is evidence of substantial progress in a much needed area.

Internship Programs

This year saw great activity and progress in the SOCIETY's hospital pharmacy internship program. The Flack-Dodds Internship Manual, introduced at the Boston meeting, has been received with enthusiasm by our members concerned with the education of the "young" of hospital pharmacy.

In February, the Division provisionally approved a long needed method for evaluating individual hospital pharmacy

internship programs. While we proceed slowly with this program, because of the impact on hospital administration and pharmaceutical education, the "Application for Provisional Evaluation of Hospital Pharmacy Internships" form appears to be the answer to our immediate needs. The approach follows closely those used by other health professions—the internship programs of the American Dental Association, the American Dietetic Association, and similar associations.

When Division evaluation of the individual hospital pharmacy internship programs becomes an accomplished fact and we expect now that this will be accomplished in the very near future, hospital pharmacy will have for the first time a minimum established level of accredited training. Internship programs operating below these levels, will of course, not have Division or SOCIETY approval.

While on the subject of internships, let me report that there are only 14 true pharmacy internships in the country, and but 14 graduate (2 year) hospital pharmacy programs. These 28 programs are turning out some 35 to 40 trained hospital pharmacists annually, not enough to satisfy the needs of the Nation. I hope that hospital pharmacy shall soon see internship programs in most of the A.M.A. approved teaching hospitals of the country *and in no others.* I ask those of you serving as chiefs of pharmaceutical services in the 850 plus approved teaching hospitals of the Nation, to explore with your administrator the feasibility of instituting such a training program in your hospital under your immediate supervision and under the general supervision of the official responsible for the other intern programs. It has been stated* in connection with medical internship programs that "a successful internship program can be carried out *only* in those hospitals in which the medical staff and hospital administration understand the principles of and are prepared to accept full responsibility for proper training." Can hospital pharmacy consider less? Can hospital pharmacy afford to endorse and approve internship programs in other than teaching hospitals where a healthy attitude and responsibility towards pedagogy exists? I think not. I, therefore, recommend that the SOCIETY insist upon such a base for its Minimum Standard for Hospital Pharmacy Internships.

Finally, on the subject of internship programs, I wish to report to the membership the growing trend to encompass in these programs greater opportunities for the embryonic hospital pharmacist to develop self confidence and ability as a drug therapy consultant. More and more, we are noting that the chiefs of pharmaceutical services, hospital administrators, and those responsible for all category internship programs in hospitals are seeing to it that the pharmacy intern receives bedside training along with his colleagues, the medical and dental interns. Here he observes examination and determination of diagnosis and the clinical management of the patient, the drug ordered, its dosage, its possible side effects, its contraindications and the vehicle discussed. He also observes investigational drugs being used in accordance with the recommendations of the Committee on Research, until recently known as the Therapeutic Trials Committee, of the American Medical Association. For example, recent interns saw the Rauwolfias, chlorpromazine, pentolinium tartrate and other new drug therapy agents including the Salk Poliomyelitis Vaccine come into clinical use. Here is the teaching of clinical pharmacology at its best. We shall see more and more of this type of training as our internship programs mature, and expand. I would hope this type of training will be declared essential and this coming year, made a required part of the Minimum Standard for Pharmacy Internships in Hospitals.

*Manual "The Essentials of an Approved Internship," Advisory Committee On Internships, Council On Medical Education and Hospitals (1951).

Pharmaceutical Education

Beginning with the Fall of 1960, the Accredited Schools of Pharmacy of the Nation swing into a one-year pre-pharmacy and four-year pharmacy course. It is fitting and proper that this SOCIETY now plan with the pharmaceutical educators, through their organization the A.A.C.P., the contents of the senior year indoctrination course in hospital pharmacy, and the future place of the graduate program of hospital pharmacy. One outstanding dean has already consulted with your president relative to his plans for a senior course in hospital pharmacy patterned after the senior year medical school program—that is, with built in hospital experience, in his case consisting of approximately one-third of the time spent in course. This is an excellent plan in my opinion and I hope other educators are thinking along similar lines. I recommend that the SOCIETY officially submit a plan of study compatible with the new five-year program to the Division for necessary action.

Scholarships and Fellowships

We have noticed this past year the interest of pharmaceutical manufacturers in making scholarships and fellowship grants available to hospital pharmacy interns. Last August, the Wyeth Company offered to establish four internships under SOCIETY auspices. Your SOCIETY is currently forming a Scholarship Committee authorized to establish conditions relative to administering scholarship grants. The Pfizer Laboratories, extending its practice of giving grants to medical interns, is now offering a somewhat similar program to hospital pharmacy interns. I understand some 19 interns are currently receiving such grants. These are healthy and constructive signs for the future of hospital pharmacy. We are pleased to see industry's interest. We are pleased to note that such grants are being maintained on a high educational level—none being made to hospitals other than those fully cognizant of their responsibilities as teaching institutions, those accredited for *medical* internship programs. Again, this is progress and reflects the "march" of hospital pharmacy in the education of our "young."

Institutes

Two one-week institutes have been planned for this year in cooperation with the American Hospital Association. One is to be held at the University of Chicago, June 13-17; the other at Emory University, Atlanta, Georgia, the week of August 22-26. These institutes will attract the usual large number of hospital pharmacists seeking "refreshers." This year, you will note, the SOCIETY is following President Beck's suggestion that two institutes be held in different geographical locations to meet the demands of hospital pharmacists. President Beck's suggestion has every indication of being most timely and wise, one that will no doubt, become an annual pattern.

With two national institutes annually, plus the regional institutes that are growing in popularity, hospital pharmacy will soon be meeting the demands of its members for annual professional refreshers.

National Hospital Formulary Service

The 21-man Advisory Committee appointed last August to study and advise on the Francke formulary proposal, has given it their enthusiastic approval. The committee membership included representatives of hospital pharmacy, hospital administration, the pharmaceutical manufacturing industry and that portion of educational pharmacy familiar with the problems of hospital pharmacy administration. On the basis of this committee's report, your Executive Committee has voted that the ASHP *shall* sponsor and offer this service to the Nation's hospitals. The financing problem

is now being studied and it can be expected that this much desired service will be an eventuality. Here again is solid progress, something tangible and time saving for hospital pharmacies, for the hospitals, and for the pharmacy committees.

Committee on Pharmacists in Government Service

Last year, I urged that this committee give attention to reviewing the duties of hospital pharmacists in the various Federal and State Government Services, and also to study the prescribed functions and responsibilities of this committee to determine if there was an overlapping with pharmacy's over-all Committee on the *Status* of Pharmacists in Government Service. You have heard today, the excellent report of that committee, as written so capably by its chairman, Charles Towne. The report that states in essence that this Committee can and should play a vital role in the activities of the Society by providing suggested guidelines for improving pharmaceutical service in Government hospitals and in maintaining closer liaison activities with pharmacy's overall steering committee, the Committee that concerns itself with the status of pharmacists in government service. With this problem settled, once and for all, this Committee can now devote its time to aiding these important pharmaceutical services to do a better job for their beneficiaries.

The Bulletin

Today, mainly because of the devotion and interest of its Editor, Dr. Don Francke, and the support of the Society, The Bulletin is well known and respected nationally and internationally. It is read by progressive hospital pharmacists everywhere. Let us now consider means of making this journal a monthly *or* as Dr. Francke has suggested, the publication, by the Society, of a smaller journal, to be supported by advertising, for free distribution to the hospitals of the Nation on the off months of Bulletin publication. I recommend that the Planning and Advisory Committee confer with the Editor of The Bulletin and explore the feasibility of one or both of these methods to give hospital pharmacy a monthly publication. There is a Latin saying that goes *"Gutta Cavat Lapidem Non Vi Sed Saepe Cadendo"*—which translated means "The drop makes a hole not by force but by constant dripping." A monthly publication in one form or another obviously adds to the Society's "Dripping" power.

Incidentally, in this progress report, let me state that another Francke landmark in the literature of hospital pharmacy will be reaching the membership soon in the form of the Educational Number (May-June Issue) of The Bulletin. It contains many articles of interest to the pharmaceutical educator, to the hospital administrator and to the teaching hospital pharmacist. For example, a new career brochure on hospital pharmacy, the Flack-Dodds internship manual and the proposed Application for the Provisional Approval of the Individual Hospital Pharmacy Internship. This number of The Bulletin will also carry a suggested course outline for teaching a course in hospital pharmacy administration and many fine articles of an educational nature. Again, progress of the kind it is a pleasure to report to you.

Public and Professional Relations

The Society has in progress an excellent public relations program as evidenced by the work of Paul Parker's Committee this past year with the hospital pharmacy career brochure. We have also an excellent interprofessional relations program—the best form in existence, consisting of the splendid quiet day-to-day accomplishments of our individual members and the Society for the betterment of pharmaceutical service in hospitals and clinics.

What we need concern ourselves with now is better intra-professional relations—the development of better means of communications between ourselves and the pharmacists in the other specialities of the pharmaceutical profession, working toward a keener understanding of the mutual problems of hospital administration, hospital pharmacy and the teaching of hospital pharmacy. Your president and Dr. Elmer Plein at the 1951 Buffalo Convention introduced a successful resolution for joint annual meetings of representatives of the A.A.C.P. and ASHP. I now recommend that the Society consider going further in this direction and that we recommend to the Division of Hospital Pharmacy of the A.Ph.A. and ASHP that its A.Ph.A. membership include a nominee of the American Association of Colleges of Pharmacy. Official representation by education on this top level hospital pharmacy planning committee would greatly facilitate the flow of authentic pertinent information on hospital pharmacy practice to the pharmaceutical educators to the betterment of hospital pharmacy courses. By such representation, education would sit in on our long-range planning with the American Hospital Association and the Catholic Hospital Association as well as our A.Ph.A. and ASHP hospital pharmacy activities.

We all agree, that hospital pharmacy, like medicine and dentistry, should have a Council on Pharmaceutical Education as a means of marshaling the thinking of pharmaceutical educators, hospital pharmacists, and hospital administrators towards solving the problems of educating young hospital pharmacists. We have such a Council in the Policy Committee of the Division of the A.Ph.A. and ASHP. Dr. Glenn Jenkins, Dean of the School of Pharmacy at Purdue, an outstanding pharmaceutical educator, is a member of this policy committee. Now all we need is official recognition and participation by the A.A.C.P. This could be done in the manner I have just suggested and I so recommend that this Society go on record as favoring such an alliance.

Also, in connection with intra-professional relations I note lately, due no doubt to a lack of communication, criticism being hurled on hospital pharmacy practices. Upon investigation, the complaints seem to be confined to one or two local incidents, but blown up to seem of national proportions. Meanwhile, ill will develops among the various specialties of pharmacy such as retail and hospital and it reflects on the profession as a whole. This Society is always anxious to sit down and discuss intra-professional problems with other pharmacy groups and to act on legitimate complaints. That is nothing more than an adult courteous and democratic process and should be continued.

International Hospital Pharmacy

Pan American Congress of Pharmacy: Last December, your Society was represented at the Pan American Congress of Pharmacy in Brazil in accordance with your stated desires that we foster and encourage the coming together of pharmacists of all peace loving, friendly nations to exchange views and experiences. As a further indication of our effort to foster international hospital pharmacy relationships, your Society, this year joined with the A.Ph.A. in inviting the Pan American Congress of Pharmacy to the United States in 1957. As hosts, we must start soon our planning for this Convention. Let us welcome our hospital pharmacist friends South of the Border and return their wonderful hospitality to us, their Northern friends who over the years visited them in the Convention cities of Havana, Cuba; Lima, Peru; and Sao Paulo, Brazil.

Federation Internationale Pharmaceutique

In September, the 16th General Assembly of the Federation Internationale Pharmaceutique takes place in London.

Several of our members hope to attend this meeting. If you plan to attend, give your name to Miss Niemeyer, so that the SOCIETY may designate you as an official delegate. This is another grand opportunity for the members of this SOCIETY to participate in international matters pertaining to hospital pharmacy and I am pleased to report on this subject to you.

World Health Organization

Last August in Boston, this SOCIETY recognized the importance of the World Health Organization drug programs relating to the *International Pharmacopoeia*, non-proprietary names and biological standardization. We resolved that our SOCIETY should contribute in every way possible to the continued success of the WHO programs. The Executive Committee was therefore requested to explore the possibility of establishing an advisory relationship to the United States Committe on International Drug Standards. Dr. Lloyd Miller, the Chairman of the U. S. Committee on International Drug Standards knows our position and will no doubt call upon us.

I should like to mention also a resolution of the Third Pan American Congress of Pharmacy and Biochemistry. This Pan American Congress urged the Governments of the Americas to use the *International Pharmacopoeia* as a guide, and requested WHO to continue its work in proposing international standards.

A similar awareness of the value of these international drug programs was revealed by the 18 health experts who attended the January session of the WHO Executive Board in Geneva. They unanimously adopted recommendations of the WHO Expert Subcommittee on International Non-Proprietary Names, designed to speed up and improve the procedures and principles for selecting recommended international non-proprietary names for pharmaceutical preparations. The waiting period is reduced from six months to four during which comments or objections to proposed names may be sent to WHO. Another revision provides that recommended names should preferably reflect the significant chemical groupings of a compound or its pharmacological classification.

At the Eighth World Health Assembly which meets next week in Mexico City, these procedures for selecting non-proprietary names will be discussed and I hope the Assembly underwrites these revisions which will strengthen the program.

The WHO Executive Board also considered the matter of non-proprietary names which is of significance to hospital pharmacy. Under the United Nations program of international controls for narcotics, governments notify the U.N. of newly-developed substances which may produce addiction. The U.N. refers these substances to WHO and, if the appropriate WHO Expert Committee finds that a substance is likely to produce addiction, it is brought under the U.N. narcotics controls. International non-proprietary names are not always available for such substances at the time that they come under these controls. Last year the U.N. Economic and Social Council requested WHO to speed up the selection of recommended non-proprietary names for narcotics. The WHO Executive Board therefore asked the Organization to consider ways of accomplishing this, including a possible suggestion to governments that they might propose suitable names to WHO at the same time that they notify the U.N. of new narcotics. I believe it would be in the interest of hospital pharmacy for appropriate governmental and also non-governmental agencies in the United States to proceed immediately with appropriate arrangements so that narcotics developed in this country may receive international non-proprietary names at the earliest possible moment. *I propose that the* SOCIETY *adopt a resolution* urging interested governmental agencies to proceed with the necessary formalities in order that suitable non-proprietary names for addicting narcotics developed in this country be proposed to WHO at the earliest possible moment.

These WHO programs have been handicapped, and they continue to be handicapped and slowed down, because WHO can employ only a minimum of staff to operate them. President Eisenhower in his January health message to Congress urged an increase in the U. S. contribution, and referred to WHO's "forceful leadership in a cooperative world-wide movement toward better health." The WHO drug programs are an integral part of the total movement toward better health.

Hospital Pharmacy—Nationally

Turning now to hospital pharmacy matters of national interest—*New and Nonofficial Remedies*: The acceptance programs of the American Medical Association have been discontinued. The full effect of this change in policy will not be felt until the 1956 N.N.R. is published, the 1955 issue having already gone to galley proof. Future monographs, we are told, will be published in the *Journal of the American Medical Association* under the generic or non-protected name only. There will be no listing of trade names or dosage forms. How practical this plan will be remains to be seen. The N.N.R. in its old form was a highly useful document to the hospital pharmacist. I recommend that this body consider a resolution congratulating the American Medical Association's Council on Pharmacy and Chemistry for its splendid work over the years in connection with N.N.R. material.

Drug Charges

The cost of drugs in hospitals and clinics is becoming more and more a subject of discussion in the lay press. Much of the publicity is unfavorable, the medication cost being confused with the cost of the administration of the medication. It would appear that hospital pharmacy could materially aid hospital management in dispelling this false impression Certainly one does not expect to be served a delightful meal in a first rate hotel at the same price that the food served sells for at the grocery store. A service charge for preparing and serving the dinner is expected and proper. This type of information should be pointed out in connection with drug charges. It might be well for our Committee on Program and Public Relations to take this problem under advisement with the hope of developing suitable public relations material for the press as well as for the conduction of studies of the various equitable charging systems in effect in many of the hospitals of the land.

Food and Drug Administration

This past year your SOCIETY has been approached by the Food and Drug Administration to explore the feasibility of some type of a cooperative Food and Drug-hospital liaison to obtain valid information on untoward effects, side reactions and new uses of drugs, old and recent. The American Association of Medical Record Librarians as well as the ASHP is interested in this project and it may well be that this tri-partite project—The Food and Drug Administration, the A.A.M.R.L. and the ASHP —will develop a valuable service for the public health of the nation. Obviously, some reporting sources need to be established in places where drugs are subject to continuous use, investigation and evaluation. What place is more appropriate than certain selected teaching hospitals of the nation.

Narcotics

I cannot refrain from commenting on one recommendation made by the Committee on Minimum Standards—that of printing on heavy card stock the Dodds-Trygstad Narcotic Committee recom-

mendations as approved by the Narcotic Bureau. I believe this to be an excellent suggestion, one that could be of considerable value to every hospital. I feel quite certain the Narcotic Bureau would give its blessing to this project and as your president, I wish to add my word of approval to this fine public service recommendation.

Horizons

And now, how can hospital pharmacy better serve the sick and injured of the nation? It is already doing an excellent job in that which we traditionally consider pharmaceutical service in hospitals. What is more, hospital pharmacy is keeping pace with the atomic age. Witness the handling of radioactive medications by some of our hospital pharmacies. In hospital management, pharmacy contributes to the efficient operation of Central Sterile Supply Departments; and in the occupational grouping hospital pharmacist-hospital administrator activities. In the professional pharmacist-administrator group I expect to see us score the greatest advances in the next decade.

Let us look at the record—

1. The latest Census Bureau estimate of the total population of this country is 164,704,230, an increase of almost three million or 1.7 percent per year. This is a birth every eight seconds, and a death every 21 seconds.

2. The number of individuals reaching 60 years and over has almost tripled in the last 40 years. According to Goodness, from 6 million in 1910 to over 18 million in 1950. As of 1950 this group constituted 12.2 percent of the population of the Nation.

3. The Federal Medical Facilities Survey and Construction Act of 1954, broadened the Hill-Burton Hospital Construction Program to include and emphasize facilities for providing services for the chronically ill. Some 60 million dollars annually has been authorized by the Federal Government to assist the states in the construction of chronic disease facilities, nursing homes, diagnostic and treatment centers, and for rehabilitation facilities.

4. Dr. John Cronin, Chief, Division of Hospital Facilities said recently that the nation's total hospital bed needs in all categories still tops 800,000 and that the majority of new hospitals (58 percent) are being located in communities with populations of less than 5,000.

So what, you ask!

1. Population growth alone demands many more *general* hospitals, an increasing number of small bed capacity hospitals, hospitals of a size that will not require the full-time services of hospital pharmacists as pharmacists without utilizing their competence as hospital administrators. Therefore, a few more schools of pharmacy should be joining with their University Schools of Hospital Administration or Business Administration to train pharmacists to serve proficiently in these two areas. Already one school of pharmacy has made a good start and another is seriously studying the problem with its state hospital officials.

2. The population increase and the increase in the aged population (over 18 million now over 60) creates huge problems in geriatric care, in the care of the mentally ill and in the care for those afflicted with one or more of the chronic diseases. Today, an estimated 5.3 million people in the United States have chronic diseases, long term illnesses or impairments requiring continuous or prolonged care.

How will the nation handle this problem? Institutionalization in the sense of the expensive general short term hospital obviously is not the answer. Men and women concerned with this growing national problem look to the nursing home (of which there are currently some 25,000 caring for some 450,000 patients), to the special hospitals for the chronically ill and impaired, to the diagnostic and treatment centers, to the rehabilitation facilities and to the home care-hospital affiliated programs. As these facilities and programs expand, as they must in the next decade, they will divert patients from the general hospitals into the less costly nursing homes, the hospitals for the chronically ill or in many instances to the home care-hospital supervised program.

Why bring this up here you ask?

We, as hospital pharmacists, must recognize our responsibility to the changing times. Nothing is static and change is inevitable. Meeting the needs of the aged, disabled and chronically ill will require many special types of hospital and outpatient pharmaceutical service, in some instances no doubt some sort of a modification of prepackaging. Further, this problem involves a study on our part of State Licensing Acts for hospitals, clinics, and nursing homes as well as State Pharmacy Laws and Regulations. We must see to it that these individuals, like other American citizens, receive proper pharmaceutical care and service. For example: One institution for the chronically ill has already sought the Society's advice. This institution has never had a pharmaceutical service in over 100 years of its existence. We shall shortly make a survey of this institution to determine the proper role of a pharmacist in providing sound pharmaceutical care to its patients. The same type of study will obviously be applied by us or others to nursing homes and to the home care-hospital affiliated programs.

Acknowledgements

And now, I would indeed be remiss if I did not at this time publicly thank you individually and collectively for the confidence and support you have given me during my tenure as your president.

To the officers elected to serve with me Vice-President Claude Busick, and Treasurer Sister Mary Berenice, my sincere thanks for their valued advice and help as we worked our way through 1954-1955. To Miss Niemeyer a special "thank you" for keeping me well informed on the day-to-day activities of the Society, and for making the life of this president such a pleasant one. To the Editor of The Bulletin, Dr. Don Francke and to Dr. Robert P. Fischelis of the Division of Hospital Pharmacy of the American Pharmaceutical Association and the American Society of Hospital Pharmacists, my thanks for their advice and counsel. To Committee Chairmen, and Committee Members, especially Anna Thiel Shannon, Charles Towne, John Scigiliano, Grover Bowles, Sister Marian, and Paul Parker who carried the heavy loads of Standing and Executive Committee activities, my sincere thanks. I ask that each member of the Society read the "Green Sheets" in detail in the July-August Issue of The Bulletin and note the fine work of these folks who carried out the plans of your Society this year. No president could have asked for a finer team to assist him. Last but not least, to the officers of the many local chapters, and to the officials of the American Hospital Association, Dr. Charles Letourneau, and Dr. Robert Cadmus; the Catholic Hospital Association, and its Ray Kneifl, and other individuals and organizations assisting us in developing this year better national and local Society activities and better hospital pharmacy practices, my deep personal appreciation and thanks, and finally to the American Association for the Advancement of Science, to the American Institute of the History of Pharmacy, and in particular to the American Pharmaceutical Association and the United States Public Health Service, my appreciation and thanks for the splendid assistance and recognition given to hospital pharmacy this past year.

I close with this thought, the motive power of hospital pharmacy as a specialty of the profession of pharmacy is the individual effort of the nation's hospital pharmacists, all trying to do a little more to better themselves and hospital pharmacy practice. The sum total of all that work, by all those people, is the thing that has made hospital pharmacy what it is today, and will decide in the long run, what it will be tomorrow.

Our cause is right and proper, we are a group united in one great humane interest—better care of the sick and injured through better pharmaceutical service in hospitals. We all take pride in the progress of these past 12 years. The future of hospital pharmacy and the SOCIETY is bright. To Claude Busick, your next president, and to the other officers who guide the destinies of this SOCIETY come tomorrow, I extend my sincere congratulations, best wishes and support.
Thank you.

Report of the Secretary

GLORIA NIEMEYER

Your secretary has continued to carry out the routine duties of the office which, in general, fall into a similiar pattern each year. However, as the organization continues to grow, the affiliated chapters become increasingly active as well as greater in number, and the interest in hospital pharmacy by allied groups becomes more evident, the secretarial duties are ever increasing. As you know, the activities of the secretary of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS are coordinated with those of the Division of Hospital Pharmacy and are carried out at A.Ph.A. headquarters in Washington. This is a service which has been provided during the past eight to ten years by the parent organization and one which has proved mutually beneficial. Once again, I want to remind you that the SOCIETY should be most grateful for this arrangement. With the limited budget which we have, it would not be possible to carry on the activities which we are able to participate in at the present time were it not for the facilities available at A.Ph.A. headquarters. In fact, neither organization would be able to function so effectively if hospital pharmacy activities were not centralized in one location.

In addition to the membership work, the SOCIETY activities which are handled by the secretary include the routine mailings, election, notification of appointments, contacts with affiliated chapters, some BULLETIN work, and a vast amount of correspondence.

Routine secretarial duties including actions on resolutions, membership work, correspondence and cooperation with the various committees and affiliated chapters, election, etc. have been handled in accordance with the requirements of the Constitution and By-Laws.

Ballots for election of officers were mailed from the office of the secretary to all active members of the SOCIETY. The Canvassing Committee, appointed by President George F. Archambault, included Mr. Robert Capehart, President of the Maryland Association of Hospital Pharmacists, P.H.S. Medical Supply Depot, Perry Point, Md.; Mr. Franklin Cooper, George Washington University Hospital, Washington, D. C.; and Mr. Basil Ketcham, President of the Philadelphia Hospital Pharmacists' Association, V.A. Hospital, Philadelphia, Pa. Officers elected for the coming year include President Claude Busick; Vice-President Milton Skolaut; and Treasurer Sister Mary Rebecca. The present secretary was re-elected at the meeting of the House of Delegates which was held in conjunction with the 1954 Annual Meeting.

It should also be noted that the membership of the SOCIETY approved the following amendments to the Constitution and By-Laws:

1. Election of the secretary for a three-year term rather than a one-year term. Election will be in the same manner as provided in the By-Laws, Chapter I, Article 5, that is, elected by the House of Delegates on the recommendation of the Executive Committee. Thus, the secretary elected at the 1955 Annual Meeting will serve for three years with subsequent elections for secretary being held in 1958, 1961, etc.

2. Election of the treasurer for a three-year term rather than a one-year term. Election will be in the same manner as provided in the By-Laws, Chapter I, Article 1, that is, on nomination at the Annual Meeting (every third year) and elected by mail ballot. Thus, the treasurer elected in 1955 and taking office in 1956 will serve for three years with subsequent elections for treasurer being held in 1958, 1961, etc.

3. The secretary, in the incapacity of the treasurer, may disburse SOCIETY funds (that is, sign checks if necessary).

The above changes will be incorporated into the SOCIETY's Constitution and By-Laws and printed in a future issue of THE BULLETIN. (See page 418 of this issue of THE BULLETIN.)

A summary of the activities of the Committee on Membership and Organization is being presented at this meeting. This will give you statistics regarding membership, applications approved for affiliation of new ASHP chapters, and the general plan for the Committee's work. The day to day membership work including mailing the annual statements, general correspondence in connection with membership, and contacts with prospective members are handled by Mrs. Virginia Dean, a member of the Division staff at the A.Ph.A. headquarters.

Through the Division Office we have worked closely with the various members of the Committee on Membership and Organization in supplying information, sample copies of our publications, and whatever help was needed. Increased attention has been given to checking lists of prospective members and inviting non-members to join both the A.Ph.A. and the ASHP. Also, in accordance with the Consitution and By-Laws, the affiliated chapters are asked to submit lists of members and these are checked against the membership rolls. I regret that I do not have a complete report to give you on this particular activity. In the near future, we hope to secure a list of members of every affiliated chapter, determine the exact number who are members of the national organizations, inform the local chapters accordingly, invite the non-members to join, and publish the information regarding the number of members in each chapter.

In connection with the affiliated chapters, we have had very close liaison with the 43 groups now actively affiliated with the ASHP. Some detail of this activity is also reported to you by the Chairman of the Committee on Membership and Organization. It should also be mentioned that there are a number of groups which have just recently organized and affiliation is pending. Among these are the Virginia group which has not yet held a meeting but has made specific plans; the Northeast Florida Hospital Pharmacists; and the Nebraska Society of Hospital Pharmacists. In order to better facilitate the possibility of meetings, the Midwest group has split into the Iowa Society and the Nebraska Society.

There are some few groups which, in their Constitution and By-Laws, do not provide for membership in the national organizations. Usually, this is a special category of members and is not necessarily true for all of the active members. This should be given consideration and some action taken at this meeting. The Executive Committee has gone on record as favoring the action taken by the SOCIETY a few years ago, that is calling this matter to the attention of the affiliated groups and urging them to require all members to be members of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

As has been suggested from time to time, consideration should also be given to the general activities of the affiliated groups, the responsibilities of the affiliates of the national organization, the responsibilities of the SOCIETY to its affiliates, and general geographical distribution of the affiliated chapters.

One official meeting of the Executive Committee was held during the past

year. This was held in Washington, D. C. on February 25 and 26, 1955. Important actions taken include the following:

1. Approved affiliation of five new chapters of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

2. Approved the general plans for the program and entertainment for the Annual Meeting.

3. Approved publication of a career booklet on hospital pharmacy, this to be worked out by the Chairman of the Committee on Program and Public Relations in cooperation with the editors of THE BULLETIN.

4. Gave consideration to clarifying the functions of the Committee on Pharmacists in Government Service and, at the same time, considered representation of the SOCIETY on the Committee on Status of Pharmacists in Government Service.

5. Approved the SOCIETY's sponsoring the proposed National Hospital Formulary Service.

6. Approved publication of a Manual on Hospital Pharmacy as proposed by the Joint Committee of the American Hospital Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS. Accordingly, it was suggested that the application for funds for publication of this Manual be made to a foundation, and that the final proposal be referred again to the Executive Committee before actual implementation.

7. Gave consideration to the possibility of offering student memberships in the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS. Due to the cost of our publication and the problems in establishing another category of membership, it was agreed that no separate classification be made. However, issues of THE BULLETIN are to be made available to Colleges of Pharmacy at a special price in order that students interested in hospital pharmacy may receive them during their course work.

In addition to the above, your president is reporting to you on special meetings and projects which have been carried out in accordance with action taken by the membership or the Executive Committee.

In accordance with the resolution passed at the 1954 Annual Meeting, your president along with the secretary, proceeded with the necessary arrangements for incorporation of the SOCIETY. This has now been completed and has been presented in final form to the Executive Committee meeting just prior to this Annual Meeting.

In closing, I wish to acknowledge the contributions and support of all members of the SOCIETY. Without your continued enthusiasm, we could not move forward.

Report of the Treasurer

SISTER MARY BERENICE

July 1, 1954 — March 31, 1955

BALANCE AND RECEIPTS

BANK BALANCE July 10, 1954		$ 5,489.31
RECEIPTS		
From Dues	6,198.25	
Contribution From an Affiliate	10.00	
Special Contribution (for Travel)	120.00	
Refund	22.69	
Total Receipts		6,350.94
Total Balance and Receipts		$11,840.25

DISBURSEMENTS AND CASH BALANCE

DISBURSEMENTS		
Annual Meeting Expenses	$ 378.75	
Audit	50.00	
Certificates and Membership Cards	168.07	
Contributions	100.00	
Expense of Election	225.36	
Postage and Express	372.27	
Publication of Annual Reports (1954)	1,272.00	
Bulletin Contribution (1954)	2,204.00	
Refunds and Bank Charged Back	31.00	
Savings Fund	1,000.00	
Special Activities	295.60	
Stationery and Office Supplies	141.42	
Telephone and Telegraph	136.90	
Travel—Officers and Committees (Including Meeting of Executive Committee)	2,890.05	
Miscellaneous	20.40	
Total Disbursements		9,285.82
BALANCE—Cash on Hand March 31, 1955		2,554.43
TOTAL DISBURSEMENTS AND BALANCE		$11,840.25

STATEMENT OF SAVINGS

Deposited in National Savings and Trust Company, Washington, D. C., 10/4/54 and 2/21/55	$ 1,000.00
Interest 12/31/54	2.50
Total Savings	$ 1,002.50

Comments made by Sister Mary Berenice on presenting the Report of the Treasurer:

It has been a privilege and an honor to serve the SOCIETY as its treasurer during the past short-year and I wish to take this opportunity to thank each member for the trust and confidence placed in me. Your attitude has been heartwarming and gratifying.

Especially do I wish to thank Miss Gloria Niemeyer, Mrs. Virginia Dean, and Dr. Archambault for their indispensable assistance and patient forbearance without which the work of the treasurer would have been extremely difficult. Again, it has been wonderful to have worked so intimately with you and I cherish the happy satisfaction that is all mine.

Minutes of Twelfth Annual Meeting

May 2-3, 1955

GLORIA NIEMEYER, *Secretary*

The Twelfth Annual Meeting of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS was held at the Hotel Fountainebleau in Miami Beach, Florida on May 2 and 3, 1955, in conjunction with the Convention of the American Pharmaceutical Association. Approximately 175 members of the SOCIETY were in attendance.

The ASHP House of Delegates had met on the previous day with 27 affiliated chapters represented by 30 delegates along with seven members of the Executive Committee and seven chairmen of special committees as delegates. (See page 403 for Report of the Meeting of the House of Delegates).

Record should also be made of the entertainment and special events which took place during the Annual Meeting. This part of the program, which was in charge of the local hospital pharmacists, is included in the Convention Story appearing on page 315 of the May-June issue of THE BULLETIN. Mr. Lee Neidlinger along with other members of the Southeast Florida Society of Hospital Pharmacists were in charge of the Sunday Evening Barbecue at Crandon Park, the Monday Night Event at the Country Club of Coral Gables, and the Tuesday Breakfast.

First Session

The first session of the Twelfth Annual Meeting was called to order by President George F. Archambault on Monday, May 2 at 9:15 A.M. The meeting was opened with an Invocation by Father James J. Walsh, Chaplain, St. Francis Hospital, Miami Beach, Florida. The president opened the meeting with greetings and welcomed the delegates and members.

Since the minutes of the Eleventh Annual Meeting were published in THE BULLETIN (September-October, 1954), it was moved, seconded and carried that reading of the minutes be dispensed with.

The president then called for communications and the secretary presented a letter of greetings from Mrs. Anna Thiel Shannon, a member of the Executive Committee who was unable to be present for the Annual Meeting. Announcement was also made that a number of letters and telegrams had been received from several of the SOCIETY'S affiliated chapters.

President Archambault made the folfowing appointments which had already been announced in the House of Delegates Meeting on the previous day:

Committee on Nominations: Allen V. R. Beck, *Chairman;* Sister Marian; and Milton Skolaut.

Committee on Resolutions: Sister Mary Berenice, *Chairman*; Paul Parker; and Robert Bogash. ***Assistants to Committee***: Sister Mary Franciscana, Cedric Jeffers; and Robert Bogash.

Announcement was also made of the Scholarship Committee, the membership of which is to be as follows: Allen V. R. Beck, *Chairman* (three year term); Walter M. Frazier (two year term); and Don E. Francke (one year term).

Fraternal delegates introduced included the following: Lt. Col. Kenneth B. Johnson, Department of the Air Force; Lt. Col H. D. Roth, Department of the Army; Lt. Comdr. Clarence W. Bowman, Department of the Navy; Mr. Vernon O. Trygstad, Veterans Administration; and Pharmacist Director George F. Archambault representing the U. S. Public Health Service.

Reports of the various committees and officers were presented and accepted as follows: Committee on Minimum Standards, John Scigliano, *Chairman;* Committee on Membership and Organization, presented by Vernon O. Trygstad in the absence of Anna Thiel Shannon, *Chairman;* Committee on Historical Records,, presented by Gloria Niemeyer in the absence of Alex Berman, *Chairman.*

In accordance with a recommendation of the Committee on Historical Records, special recognition was given Miss Adela Schneider, Chief Pharmacist at the Southern Pacific Hospital in Houston, Texas, and Sister Mary Blanche of the Sacred Heart Sanitarium in Milwaukee, Wisconsin, for historical contributions. In both cases, histories of the respective local affiliated chapters were presented. The commendation, presented by Dr. Glenn Sonnedecker, secretary of the American Institute of the History of Pharmacy, is published in full on page 317 of the May-June (1955) issue of THE BULLETIN. On presenting the awards, Dr. Sonnedecker expressed appreciation for the interest shown by hospital pharmacists and the SOCIETY in the work of the A.I.H.P.

At this point President Archambault called on Mr. Newell Stewart, president of the American Pharmaceutical Association, who brought greetings from the parent organization. He expressed a deep interest in the SOCIETY'S work and praised the hospital pharmacists for the great strides being made in their specialty.

Announcement was made of the activities of the hospital pharmacists in National Hospital Week and Mr. J. Warren Lansdowne, chairman of the A.Ph.A.'s Committee on Public Relations was introduced to present a plaque for the outstanding hospital display during the 1954 National Hospital Week. The award, presented to the University Hospital, Ann Arbor, Michigan, was accepted by Mr. Robert Lantos who had been an intern at University Hospital at the time the display was prepared. Mr. Lansdowne, in making the award, commented on the A.Ph.A.'s public relations program and participation in National Hospital Week and National Pharmacy Week by hospital pharmacists.

Continuation of the reports included that of the Committee on Program and Public Relations, presented by Paul F. Parker, *Chairman;* and the Committee on Pharmacists in Government Service, presented by Orville Miller in the absence of Charles Towne, *Chairman.*

Following the report of the Committee on Pharmacists in Government Service, Milton Skolaut commented on the work of the over-all Committee on the Status of Pharmacists in Government Service having representation from the national pharmaceutical organizations. Mr. Skolaut, representing hospital pharmacy, serves as one of the A.Ph.A.'s three members.

Presentation of the reports continued as follows: Committee on Special Projects, Robert C. Bogash, *Chairman*; Committee on Narcotic, Hypnotic, Ethyl Alcohol, Spirituous Liquors and Other Security and Control Type Medication, presented by Gloria Niemeyer in the absence of Sister Mary Etheldreda, *Chairman;* Committee on Disaster Preparedness, Ludwig Pesa, *Chairman*; Committee on Pharmacy Operated Central Sterile Supply, Milton Skolaut, *Chairman;* Committee on Isotopes, Clifton Latiolais, *Chairman;* (at this point Mr. Basil Ketchum, V.A. Hospital, Philadelphia, announced a course in Radiosotopes which is being offered at the Philadelphia College of Pharmacy and Science in June); and Committee on International Hospital Pharmacy Activities, Don E. Francke, *Chairman.*

The meeting recessed for ten minutes.

The meeting was again called to order and the president made several announcements pertaining to the activities during the week. Lt. Cmdr. Clarence Bowman of the Department of the Navy who had not been in the room when the fraternal delegates were introduced was called on.

Committee reports continued as follows: Advisory Committee on Hospital Pharmacy Examination, Richard Sherwood, *Chairman*; Advisory Committee on A National Hospital Formulary Service, Don E. Francke, *Chairman.*

At this point Mr. Allen V. R. Beck, chairman of the Planning and Advisory Committee, commented on the activities of this Committee during the past year, pointing out that the Committee reports directly to the Executive Committee.

Reports continued as follows: Report of the Treasurer, Sister Mary Berenice; Report of the Secretary, Gloria Niemeyer; and Report of the Division of Hospital Pharmacy, Don E. Francke, *Director*.

The meeting was turned over to the Vice-President, Claude Busick, who introduced George F. Archambault for the Address of the President.

The meeting adjourned at 12:35 P.M.

Second Session

The second session of the 1955 Annual Meeting was opened by President Archambault on Monday, May 2 at 2 P.M. Since there was no unfinished business, the meeting was turned over to Mr. Paul Parker, chairman of the Committee on Program and Public Relations. The following papers were presented:

"Educational Goals in Hospital Pharmacy," by Glenn L. Jenkins.

"Fundamentals of Technical Writing," by Austin Smith.

"Hospital Pharmacy Internships," by G. H. Hunt.

"Proposed Evaluation of Hospital Internships—Sponsored by Division of Hospital Pharmacy of the A.Ph.A. and ASHP," presented by Don E. Francke in the absence of Robert P. Fischelis.

Panel: "Evaluation of Training Programs (Internships) and Prerequisites for Positions in Hospital Pharmacy." Allen V. R. Beck, *Moderator*. Participants included C. C. Hillman, W. Arthur Purdum, and Evlyn Gray Scott.

The second session adjourned at 4:30 P.M.

Third Session

The third session of the 1955 Annual Meeting was called to order at 9:00 A.M. on Tuesday, May 3, 1955. There being no unfinished business, the meeting was turned over to Paul Parker, who presented the following program:

"What Constitutes a Limited Control Program in Hospital Pharmacy?" by Noel Foss.

"Equipment Used in Bacterial Filtration," by Louis P. Jeffrey.

"Equipment Used in Preparing Small Volume Injections," by John Scigliano.

"A Procedure for Detecting the Dilution of Meperidine Hydrochloride in Multiple Dose Vials," by James D. McKinley, Jr.

"Recommendations for Vitamins and Parenteral Therapy," by Sister Mary John.

"A Program for Improving Pharmacy Service in State Hospitals," by Glen Sperandio.

"The Practice of Pharmacy in a Rural Medical Center," by Marjorie O'Boyle.

"Maintaining Harmonious Relationships Between the Pharmacy and the Nursing Service," by Sister Marian.

The Tuesday Morning Session adjourned at 12:15 P.M.

Fourth Session

The fourth and final session of the ASHP Annual Meeting convened at 1:30 P.M., Tuesday, May 3. Papers presented at this time included the following:

"The Proposed National Hospital Formulary Service," by Don E. Francke.

Following this paper there was an open discussion on the formulary service with numerous comments from the floor. In general, enthusiasm and interest were expressed in the possibility of the Society sponsoring this activity.

"Public Relations for Hospital Pharmacy," by Lawrence McCracken.

"What the Hospital Pharmacist Should Know Regarding Actions of Some of the Newer Drugs," by Robert Bogash.

This concluded the program and after thanking the participants, Mr. Parker turned the meeting back to President Archambault for the final business session.

Sister Mary Berenice, chairman of the Committee on Resolutions was called on for the Report. The following resolutions *as finally passed* are printed below. In addition to the resolutions introduced by the Committee, one was submitted from the floor. This includes the one under "Program for Annual Meeting."

Pharmacy Operated Central Sterile Supply Services

Whereas the president of the American Society of Hospital Pharmacists charged the Committee on Pharmacy Operated Central Supply Services with the problem of studying pharmacy operated central sterile supply services, and

Whereas the Committee has given consideration to the various aspects of such a combined service,

Be it resolved that the American Society of Hospital Pharmacists further explore the desirability of such a combined service, and

Be it further resolved that the proposed syllabus for an elective college course be completed and presented to the American Association of Colleges of Pharmacy if indicated, and

Be it further resolved that the Committee on Pharmacy Operated Central Sterile Supply Services contact and develop satisfactory working relations and liaison with the national nursing associations of the United States, this to be carried out with caution and judgement on the part of the members of the Committee, and

Be it further resolved that the combination of these services should not be considered a requirement for full recognition of either the hospital pharmacy and/or its educational program.

Procedural Manual for Hospital Pharmacy

Whereas the Joint Committee of the American Hospital Association and the American Society of Hospital Pharmacists has approved compilation of a procedural manual for hospital pharmacy,

Be it resolved that the outline submitted by the Committee on Minimum Standards be referred to the Joint Committee for consideration in the development of a manual suitable to the needs of the individual hospital pharmacy.

U.S. Contribution to WHO

Recognizing the importance of the world-wide programs of the World Health Organization, and in particular, the importance to hospital pharmacy of the WHO measures to promote more uniform international drug standards as implemented through the programs relating to the *International Pharmacopoeia*, non-proprietary names and biological standardization, and

Whereas the continued success of such programs requires adequate financial support for WHO, therefore

Be it resolved that the American Society of Hospital Pharmacists through its parent organization, the American Pharmaceutical Association, urge the Congress of the United States to put into effect the recommendation of the President, by increasing the statutory authorization for the United States contribution to WHO, and

Be it further resolved that the secretary be instructed to transmit copies of this resolution to the secretary of the American Pharmaceutical Association asking that it be transmitted to the proper agencies.

Constitution and By-Laws

Whereas it has been suggested by the president of the American Society of Hospital Pharmacists in his presidential address that the best interest of hospital pharmacy and the Society will be served by certain changes in the Consitution and By-Laws and by certain changes in the methods of operation of the Society's affairs, and

Whereas our president has suggested that his recommended changes in this

regard be made the study of the Planning and Advisory Committee of the Society this coming year,

Be it resolved that the Society instruct the Planning and Advisory Committee to take under advisement the suggestions of the president, specifically those involving the co-signing of checks, the method of electing officers, the increase in the number of meetings of the House of Delegates and the election of the Planning and Advisory Committee to a standing committee status and report on these matters at the mid-winter meeting of the Executive Committee.

Recording for Affiliated Chapters

Whereas it has been recommended by many of the affiliated chapters of the Society that the recorded messages from A.Ph.A. and ASHP officers should be made an annual project because of the excellent relationship the project created between the Society and its chapters,

Be it resolved that the Society endorse this recording project, and

Be it further resolved that the Society express to the Division of Hospital Pharmacy of the American Pharmaceutical Association and the American Society of Hospital Pharmacists its wishes to see this project continued and express its appreciation of this service.

Undergraduate Course in Hospital Pharmacy

Whereas it has been recommended by the president in his presidential address that the Society develop in collaboration with pharmaceutical educators a plan of study for an undergraduate study course in hospital pharmacy compatible with the new five-year program,

Be it resolved that the Society refer this recommendation to the Committee on Minimum Standards with the suggestion that they prepare such an outline and that they seek advice in this project from pharmaceutical educators familiar with hospital pharmacy practices and from hospital administrators.

Monthly Publication

Whereas it has been recommended by the president in his presidential address that consideration be given to making The Bulletin a monthly publication or in lieu of this approach, the issuance of a separate journal, supported by advertising, for distribution to all hospitals, clinics and nursing homes of the Nation,

Be it resolved that the Society approve this program in principle and that the Planning and Advisory Committee be instructed to confer with Editor Francke and report to the Executive Committee at its mid-winter meeting on the feasibility of this plan.

A.A.C.P. in Division Activities

Whereas it has been recommended by the president in his presidential address that the Division of Hospital Pharmacy of the A.Ph.A. and the ASHP officially recognize the American Association of Colleges of Pharmacy in its Division activities,

Be it resolved that this Society be recorded as favoring such an alliance and be it further recommended that the secretary be requested to inform the Chairman of the Policy Committee of the Division of Hospital Pharmacy of our position on this matter in order that he may explore with the A.Ph.A. and the A.A.C.P. the feasibility of such an alliance at an early date.

Non-Proprietary Names

Recognizing the importance, both to hospital pharmacy and to the international control of narcotic drugs by the United Nations, of securing suitable non-proprietary names for narcotic substances at the earliest possible moment, therefore

Be it resolved that the American Society of Hospital Pharmacists urge interested agencies in the United States, including professional, commercial and governmental agencies, to proceed with arrangements so that suitable non-proprietary names for narcotics developed in the United States may be proposed to the World Health Organization at the earliest possible moment, and

Be it further resolved that the secretary be instructed to send copies of this resolution to the following: The American Pharmaceutical Association, the American Drug Manufacturers Association, the American Pharmaceutical Manufacturers Association, the Committee on Drug Addiction and Narcotics of the National Research Council, the Council on Pharmacy and Chemistry of the American Medical Association, the Secretary of Health, Education, and Welfare, and the Secretary of the Treasury.

Cost of Drugs in Hospitals

Whereas it would appear that the Society through its Committee on Program and Public Relations could materially aid in preparing material to dispel the illusion of the high cost for the administration of drugs in hospitals,

Be it resolved that the aforementioned Committee be instructed to take this subject under advisement as indicated in the address of the president and that every effort be made by this Committee to develop suitable public relations material to combat this fallacy.

Narcotic Forms

Whereas the Committee on Minimum Standards and the president have both indicated the desirability of the Society printing the Dodds-Trygstad Report appearing in the September-October (1952) issue of The Bulletin for free or nominal charge distribution to hospital pharmacists and hospitals, and

Whereas it is believed by the Society that this would be an excellent and worthwhile professional service for the Society to offer,

Be it resolved that the secretary of the Society and the Editor of The Bulletin explore with the Bureau of Narcotics their reaction to this proposal and, if favorable, take necessary action to institute this service.

Contribution of N.N.R.

Whereas the Council on Pharmacy and Chemistry of the American Medical Association shall no longer issue the *New and Nonofficial Remedies* in its present form, and

Whereas this service has been most helpful to hospital pharmacists,

Be it resolved that this Society commend the Council on Pharmacy and Chemistry of the American Medical Association for its splendid contribution to sound pharmacological practice over the years, and

Be it further resolved that this Society extend its best wishes to the Council on its new program, and

Be it further resolved that the Secretary of the Society be instructed to transmit a copy of this resolution to Dr. Robert Stormont of the A.M.A.

Radioactive Isotopes in Hospitals

Whereas the various applications of radioactive isotopes have now been developed to the point that many hospitals are actively considering the possibility of initiating an isotope program, and

Whereas certain chemicals have been continually used in various forms in the diagnosis and treatment of disease, and

Whereas by adding the property of radioactivity these chemicals are modified but are still classified as drugs,

Be it resolved that the radioactive medications in hospitals be procured and dispensed by the pharmacy department if proper facilities and qualified personnel are available, and further, that the pharmacist be responsible to the Committee on Isotopes of the hospital through the administrator or medical director, and

Be it further resolved that either a radiologist or physicist be appointed as a consultant to the technical operations of the isotope section of the pharmacy, particularly in formulating the original procedures and any changes thereof, and

Be it further resolved that the Society cooperate with the various organizations concerned to make it possible for hospital pharmacy to provide a radioactive pharmaceutical service in hospitals.

Membership and Organization

Whereas the Committee on Membership and Organization during the past year has been divided into subcommittees to work with various groups of hospital pharmacists (civilian, government and religious), and

Whereas the chairmen of these subcommittees have worked closely with the members of each group and the total results of this years' activities have been gratifying, and

Whereas the interest among affiliated chapters of the ASHP has been widespread and five new chapters have been added to the SOCIETY since our last Annual Meeting, and

Whereas the total membership has increased, therefore

Be it resolved that the SOCIETY give special attention to the efforts of the affiliated chapters, making every effort to further coordinate the activities of the affiliated chapters with the work of the national organization, and

Be it further resolved that the SOCIETY reiterate its position regarding membership in affiliates, stating that all members of affiliated chapters of the ASHP must be members of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS, and

Be it further resolved that students interested in hospital pharmacy be encouraged to apply for early membership in the ASHP. This may also be given considered attention by the Committee on Program and Public Relations.

Investigational Drugs

Whereas the Food and Drug Administration has approached the American Association of Medical Record Librarians and the AMERICAN SOCIETY OF HOSPITAL PHARMACSITS with a request to explore the establishment of some form of reporting sources where drugs are subject to continuous use, investigation and evaluation, and

Whereas the SOCIETY is of the opinion that such a service would be a valuable public health service to the Nation,

Be it resolved that the Executive Committee be requested to explore further this suggestion through a meeting of representatives of the Food and Drug Administration, the American Association of Medical Record Librarians and this SOCIETY, and

Be it further resolved that the Executive Committee be empowered to take such action as is recommended to foster the development of this program on a voluntary basis in the teaching hospitals of the nation.

Hospital Pharmacy Examination

Whereas there is a need for multiple-choice examination material by government agencies (Federal, State, and Local) and state boards of pharmacy on hospital pharmacy and hospital pharmacy administration and,

Whereas examinations of this type in the general field of pharmacy are available from the American Public Health Association,

Be it resolved that the work of the Society's Committee, appointed to develop this type of examination material, be continued, and

Be it further resolved that the Committee work in cooperation with the American Public Health Association.

Tax-Free Alcohol in Hospitals

Whereas the Committee on Narcotics, Hypnotics, Ethyl Alcohol, Spirituous Liquors, etc. has been unable to complete the work which they had planned,

Be it resolved that this Committee be continued during this coming year, and

Be it further resolved that the new Committee work closely with the Executive Committee in their approach to the problem involved in the use of tax-free alcohol in hospitals.

Pharmacists in Small Hospitals

Whereas it is recommended by the chairman of the Committee on the Role of the Pharmacist in the Small Hospitals that in the light of the present status of the proposed study of hospital pharmacy services, the Committee's work be extended for one year, therefore,

Be it resolved that the Committee's scope and functions be continued for the year 1955-1956.

Public Relations Program

Whereas good public relations play an important part in the development of the SOCIETY,

Be it resolved that the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS proceed with a long range public relations program, in accordance with the plan outlined by the 1955 Committee on Program and Public Relations, and

Be it further resolved that the public relations work continue to be carried out by the SOCIETY's Standing Committee on Program and Public Relations during the forthcoming year, and

Be it further resolved that the Executive Committee give consideration to this total program and the advisability of establishing separate committees to handle the program for annual meetings, institutes, etc.

Committee on Economic Poisons

Whereas hospital pharmacists by their profession are dedicated to public health, and

Whereas the SOCIETY is interested in all aspects of public health and is deeply concerned regarding the problems of accidental poisoning,

Be it resolved that the Committee on Economic Poisons be continued, and

Be it further resolved that the Executive Committee consider a method of compiling information for hospital pharmacists on ingredients included in various economic poisons, and

Be it further resolved that the Northern California Society be commended for its efforts in this field.

International Activities

Be it resolved that the recommendations of the Committee on International Hospital Pharmacy Activities be approved and implemented, and

Be it further resolved that the SOCIETY continue to devote attention to international pharmacy activities.

Representation on Committee on Status of Pharmacists In Government Service

Resolved that the SOCIETY express appreciation to the American Pharmaceutical Association for extending the opportunity for representation of the ASHP on the Committee on Status of Pharmacists in Government Service, and

Be it further resolved that the SOCIETY's representative be consulted on matters affecting hospital pharmacy.

Amendment to Minimum Standard For Pharmacy Internships

Resolved that Section III of the Minimum Standard for Pharmacy Internships in Hospitals be amended to read as follows:

III. Qualifications of the Training Hospital—Hospitals offering pharmacy internship programs for certification shall be general hospitals approved for internship training by the Council on Medical Education and Hospitals of the American Medical Association. Approved hospitals shall have active outpatient pharmacy services.

Resolved further that this resolution be transmitted to the Division of Hospital Pharmacy with a request that the amendment be incorporated into the Minimum Standard for Pharmacy Internships in Hospitals.

Hospital Formulary Service

Whereas the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS has approved sponsorship of the National Hospital Formulary Service, and

Whereas the program envisioned and presented by Don E. Francke is one of greater potential and impact on hospital pharmacy practice than any other program undertaken by the SOCIETY, therefore

Be it resolved that the SOCIETY endorse and approve the decision of the Executive Committee to sponsor a hospital formulary service along the general

outline as presented in the article entitled "A Proposal for a National Hospital Formulary Service," published in THE BULLETIN, September-October 1954, and

Be it further resolved that the recommendations contained in the Report of the Advisory Committee on the Proposed National Hospital Formulary Service be approved in principle and referred to the Executive Committee for study and appropriate action, and

Be it further resolved that the Executive Committee give its fullhearted support in initiating this program.

Standard Containers

Whereas the U.S.P. and the N.F. direct that many of the official preparations be packaged, stored and preserved in air-tight, light-resistant containers, and

Whereas many medications are normally consumed in relatively short periods, and

Whereas studies indicate that these many times have long "shelf life" when prepackaged in hospitals, and

Whereas adequate protection should be provided to maintain full therapeutic effectiveness,

Be it resolved that the SOCIETY go on record as condeming the practice of using paper boxes, envelopes and ointment tins as medication containers, and

Be it further resolved that the SOCIETY recommend that the standard containers meet the air-tight, light-resistant requirements of the U.S.P. and N.F.

Publication of Text and Equipment Lists

Whereas the study of text and equipment lists is a continuing one,

Be it resolved that the SOCIETY, through its official publication, THE BULLETIN, release information relative to acceptable texts and description of equipment with advantages and disadvantages as the information is made available to its editors.

Nonprofessional Personnel

Resolved that the SOCIETY caution hospital pharmacists against the indiscriminate use of nonprofessional help in areas where a registered pharmacist only is professionally and legally qualified.

Syllabus for Course in Hospital Pharmacy

Whereas a course outline to serve as a hospital pharmacy indoctrination has not been published,

Be it resolved that the "1951 Proposed Syllabus for the Course in Hospital Pharmacy Administration" be referred to the Editors of THE BULLETIN to consider publication possibility.

To Dr. Sarah Hardwicke

Resolved that the SOCIETY extend to Dr. Sarah Hardwicke, Secretary, Council on Professional Practice, American Hospital Association, our sincere best wishes for success in her new position and offer her the SOCIETY's wholehearted support.

Appreciation

Resolved that the SOCIETY express its sincere appreciation to the American Pharmaceutical Association and especially to Dr. Robert P. Fischelis, its able secretary, and also to Dr. Don E. Francke, director of the Division of Hospital Pharmacy for the invaluable assistance given to hospital pharmacy and to the SOCIETY during the past year.

Resolved that the SOCIETY extend its sincere appreciation to the American Hospital Association and in particular to Dr. Charles Letourneau and Dr. Robert Cadmus for their splendid cooperation with the SOCIETY and for their contribution to hospital pharmacy.

Resolved that the SOCIETY extend its sincere appreciation to the Catholic Hospital Association and in particular to its Executive Secretary, Mr. M. Ray Kneifl, for his untiring efforts in promoting better hospital pharmacy practice.

Whereas the publication known as *Tile and Till* during the past months published the article entitled "What's Ahead For Hospital Pharmacy?"

Be it resolved that the secretary be instructed to express our appreciation to the editor of *Tile and Till* for the publication of this excellent article by forwarding to him a copy of this resolution.

Resolved that the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS extend a rising vote of thanks to the Committee on Program and Public Relations of the Florida Society of Hospital Pharmacists for the excellent program arrangements, facilities and courtesies extended to the SOCIETY in this land of Paradise—Miami Beach.

In recognition and sincere appreciation for the excellent self-sacrificing contributions and untiring efforts in the interest of the SOCIETY,

Be it resolved that the SOCIETY extend to Miss Gloria Niemeyer a rising vote of Thanks.

Program for Annual Meeting

Resolved that a separate program for the Annual Meeting of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS be printed each year, and

Be it further resolved that consideration be given to the possibility for providing some type of identification for hospital pharmacists attending the Annual Meeting.

Following the Report of the Committee on Resolutions, President Archambault expressed appreciation to the members of the Committee.

Nominations

Allen V. R. Beck, chairman of the Committee on Nominations was called on for the Report. He presented the following nominations for officers for the 1955-1956 terms:

For President: Robert C. Bogash, New York, N. Y.; and Paul F. Parker, Chicago, Ill.

For Vice-President: Milton W. Skolaut, Bethesda, Md.; and Charles G. Towne, Los Angeles, Calif.

The following nominations for treasurer were presented pointing out that, in accordance with the recent change in the SOCIETY's Constitution and By-Laws, the treasurer is elected for a three-year term. The following nominations were presented for the office of treasurer for a three-year term beginning in 1956: Sister Mary Berenice, St. Louis, Mo.; and Sister Mary Florentine, Columbus, Ohio.

Following the Report a motion was made, seconded and carried that the Report of the Committee on Nominations be accepted. The president pointed out that the By-Laws provide for nominations from the floor. Since there were none, it was moved, seconded and carried that the nominations be closed.

Under Unfinished Business, Mr. Paul Parker asked to make an announcement concerning a survey in connection with preparing a career booklet.

Officers for the new year were installed, including President Claude Busick, Vice-President Milton Skolaut, Secretary Gloria Niemeyer, and Treasurer Sister M. Rebecca (in absentia). Mr. Busick spoke briefly concerning SOCIETY activities during the coming year and asked for the cooperation of the membership. He also announced that the 1955 H.A.K. Whitney Lecture Award was to be presented to the SOCIETY's Secretary, Miss Gloria Niemeyer. The Award is presented annually by the Michigan Society of Hospital Pharmacists.

The meeting was turned back to President Archambault for adjournment. Before adjourning, special recognition was paid to Claude Busick by Marie Kuck in the name of the Northern California Society of Hospital Pharmacists; and to Gloria Niemeyer by Clara Henry representing the Association of Women Pharmacists of the Pacific Coast.

Following announcements, the Twelfth Annual Meeting of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS was adjourned at 4:15 P.M.

Report of the Meeting of the House of Delegates

GLORIA NIEMEYER, *Secretary*

The Sixth Annual Meeting of the House of Delegates of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS was called to order by President George F. Archambault at 2 P.M. on Sunday, May 1 at the Hotel Fountainebleau in Miami Beach, Florida. President Archambault welcomed the delegates and members and quoted from the SOCIETY'S By-Laws in outlining the purpose of the House of Delegates.

The minutes of the previous meeting were called for. The secretary pointed out that they had been published in the Proceedings Issue of THE BULLETIN and asked if the members wanted the minutes read at this time. On the motion of Don Francke, second by Milton Skolaut, and carried, reading of the minutes of the 1954 Meeting of the House of Delegates was dispensed with.

The roll call of delegates showed that 27 affiliated chapters were represented by a total of 30 voting delegates. Reports from the chapters were received in writing, and delegates were asked to bring any special problems before the group. Seven members of the Executive Committee and seven chairmen of special committees were also present, making a total of forty-four voting members in the House.

Fraternal delegates present were then introduced by President Archambault. Those attending the SOCIETY'S sessions during the week included: Lt. Col. Kenneth B. Johnson, Department of the Air Force; Lt. Col. H. D. Roth, Department of the Army; Lt. Cmdr. Clarence W. Bowman, Department of the Navy; Vernon O. Trygstad, Veterans Administration; and Pharmacist Director George F. Archambault representing the U. S. Public Health Service.

Mr. Lee Neidlinger, chairman of the Entertainment Committee for the Annual Meeting was introduced. Mr. Neidlinger, representing the local hospital pharmacists, welcomed the SOCIETY members to Miami Beach and outlined plans for entertainment during the week.

In order to expedite the work of the committees during the week, President Archambault announced the following appointments:

Committee on Nominations: Allen V. R. Beck, *Chairman;* Sister Marian; and Milton Skolaut.

Committee on Resolutions: Sister Mary Berenice, *Chairman;* Paul Parker; and Robert Bogash. *Assistants to Committee*: Sister Mary Franciscana; Cedric Jeffers; and Robert Bogash.

On appointing the committees, the president pointed out some of the duties and the need for help from the delegates in carrying out the work during the Annual Meeting.

Announcement was also made of the Scholarship Committee, the membership of which is to be as follows: Allen V. R. Beck, *Chairman* (three-year term); Walter M. Frazier (two-year term); and Don E. Francke (one-year term).

In accordance with the Constitution and By-Laws, the secretary of the SOCIETY is elected by the House of Delegates on the nomination of the Executive Committee. A recent change in the Constitution and By-Laws provides for a three-year term for the secretary; with elections to be held in 1955, 1958, etc. The secretary elected in 1955 therefore takes office immediately and serves for a three-year term. Allen V. R. Beck, a member of the Executive Committee, presented the Committee's nomination and moved that Gloria Niemeyer be elected secretary of the SOCIETY for the ensuing three-year term. The motion was seconded and carried.

A brief report outlining the plans for the Committee on Resolutions was presented by the chairman, Sister Mary Berenice. A statement on the work of the Committee on Nominations was presented by the chairman, Allen V. R. Beck.

President Archambault then introduced the president-elect, Claude Busick for his Address. Mr. Busick outlined plans for the coming year and announced committee appointments.

The meeting was then turned over to Paul Parker, chairman of the Committee on Program and Public Relations. He outlined the plan for presenting a discussion which would be of interest to the delegates from the affiliated chapters and asked that they give particular attention to their role as delegates to the Annual Meeting. He suggested types of programs and activities which would contribute to better meetings and greater participation among hospital pharmacists in the local groups.

"Representation of the ASHP Affiliates in the SOCIETY," was discussed by Walter Frazier. He pointed out ways in which the local groups can participate in activities on a national basis. He urged the affiliated chapters to have representation at the national meeting and further that the delegates be informed concerning the thinking on the local level.

"Society Representation in the ASHP Affiliated Chapters," was discussed by the secretary, Gloria Niemeyer. She outlined the means of communication between the affiliates and the national organization emphasizing the need for officers of ASHP chapters to be in contact with the national groups. She further mentioned some of the responsibilities of the SOCIETY to the affiliates.

Following a brief discussion from the floor and announcements, the meeting was adjourned at 4:15 P.M.

Report of the Committee on Membership and Organization

ANNA THIEL SHANNON, *Chairman*

The Committee on Membership and Organization for 1954-1955 was divided into three subcommittees designated to work with the different groups of hospital pharmacists—Civilian, Government and Religious. The chairmen of these sub-committees have worked closely with the members of each group and the total results of this year's activities in connection with membership and organization have been gratifying. Special mention should be made of the work of James D. McKinley of Houston, Texas, Arnold Dodge of Washington, D. C. and Sister M. Teresa of Oklahoma City, Oklahoma, who served as chairmen of the groups. Sister Teresa has given particular attention to contacting Sisters who are prospective members of the A.Ph.A. and the ASHP and members of her Committee have been active in the work of the Committee on Membership and Organization.

Although SOCIETY growth is not measured altogether by the number of members, we do review the statistics from year to year and publish this information as a matter of record. In summary, we have a total of 2,266 members, a net gain of only 68 members since August 1, 1955. Although this does not seem appreciably great, we should take into account the fact that those dropped during the past year could have been the result of the raise in dues which went into effect in January, 1954. In view of the fact that we thought possibly there would be a drop in membership, we are encouraged by even a small gain.

Actually, 237 new applications have been accepted since our last convention in August, 1954. The present membership statistics show the following:

Active	—	1,939
Associate	—	324
Honorary	—	2
Life	—	1
Total ASHP Members		2,266

Interest among affiliated chapters of the ASHP has been widespread and five new chapters have been accepted since

our last convention, making a total of forty-three affiliates. The Executive Committee recently approved affiliation of the following new chapters:

Southeast Florida Society of Hospital Pharmacists

Iowa Society of Hospital Pharmacists

Rhode Island Society of Hospital Pharmacists

The Society of Hospital Pharmacists of the State of Oregon

Minnesota Society of Hospital Pharmacists

The latter two have been approved on a "provisional" basis since all of their members are not members of the A.Ph.A. and the ASHP. In these instances, the applications will again be reviewed in the next year.

Two other organizations—the Nebraska Society of Hospital Pharmacists and The Hospital Pharmacists' Association of Greater Kansas City—have recently applied for affiliation. We are corresponding with these groups and as soon as the requirements for affiliation are fulfilled, the applications will be referred to the Executive Committee.

In accordance with the resolution passed at the 1954 Annual Meeting, the Executive Committee considered the possibility of offering student membership in the ASHP. Problems which are inevitable along with establishing another category of membership in the SOCIETY were considered. It was agreed that students interested in the SOCIETY could become Associate Members at the regular fee providing they are members of the A.Ph.A. In cases in which a group or class of students are interested in receiving THE BULLETIN, it should be made available directly to the College of Pharmacy at a special price, this to be determined by the Editor.

Recommendations

It is recommended that the SOCIETY:

1. Give special attention to the work of the affiliated chapters making every effort to further coordinate the activities of the national organization and the affiliated chapters.

2. Reiterate its position regarding membership in affiliates stating that all members must also be members of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

3. Consider the possibility of making membership in the SOCIETY obligatory for hospital pharmacists.

4. Compile a handbook for local groups outlining procedures for meetings, programs, and including a statement outlining what the ASHP is doing for new pharmacists in the field.

5. Encourage students interested in hospital pharmacy and inspire early membership in the ASHP.

In conclusion, I wish to express appreciation to the members of the Committee, to the many other individuals who have contributed toward membership activities, and to those who carry out membership activities at the A.Ph.A. headquarters in Washington.

Report of the Committee on Minimum Standards

JOHN A. SCIGLIANO, *Chairman*

In keeping with the proposal of our president, this Committee was divided into two sub-groups. This report will present the activities of each separately. First, the Report of the Subcommittee on Minimum Standards.

As concerns a Procedural Manual for hospital pharmacy administration, the following outline is submitted for the consideration of the SOCIETY.

I. General
   - A. Function and Responsibilities of Pharmacy Department.
   - B. Pharmacy Committee.
   - C. Pharmacy Reference Library.

II. Pharmacy Management
   - A. Level of Performance of Hospital Pharmacy.
   - B. Selection of Applicants.
   - C. Prescription Filing Procedures.
   - D. Expiration Dated Drugs' Records.
   - E. Ward Issues Policies.
   - F. The Pharmacy Requisition.
   - G. Identification and Control of Prepackaged Pharmaceuticals.

III. Pharmaceutical Manufacturing
   - A. Equipment.
   - B. Records.
   - C. Formulations.
   - D. Special Techniques.

IV. Narcotics, Hypnotics, Alcohol and Spirituous Liquors
   - A. Complete control system.
   - B. Disposition of Excess, Useless and Undesirable Narcotics.
   - C. Policy Relative to the Honoring of Prescriptions for habit forming drugs.

V. Inventories
   - A. Store room.
   - B. Stock control system.

It is hoped that this outline will be utilized as a starting point to the development of a Manual suitable to the needs of the individual hospital pharmacy.

The Committee wishes to advise the SOCIETY of the need for the introducing of a supply service of forms and systems to hospitals. The various forms reviewed by the Committee, though many in number and varied in format, essentially were concerned about similar data.

Study of the problem concerned with standard medication containers shows that the U.S.P. and the N.F. direct many of the official preparations be packaged, stored and preserved in tight, light-resistant containers. Although medications are normally consumed in relative short periods, studies indicate that many have long "shelf life" and that adequate protection should be provided to maintain full therapeutic effectiveness. The Committee, therefore, goes on record as denouncing the practice of using paper boxes, envelopes, or ointment tins as medication containers. Further, it recommends that the standard container be of the amber type to insure the least deterioration effects possible from the action of actinic light rays.

The Committee would emphasize the need for labels on medication containers to carry the institution's headings as well as medication name and strength, and strongly recommends eliminating the practice of using the "red-outlined" Dennison-type label.

It is concluded that the study of the text and equipment lists is a continuing one and that the SOCIETY, through its official organ, THE BULLETIN, release information relative to acceptable texts and description of equipment, with advantages and disadvantages, as the information is made available to the editors by hospital pharmacists receiving experience in their use.

The Committee recommends that the SOCIETY caution hospital pharmacists against the indiscriminate use of non-professional help in areas where substitution for a pharmacist would tend toward the reduction in the pharmacist's dexterity in pharmaceutical manipulations with subsequent lowering of the quality of clinical care to patient and loss of professional stature.

Next, the Report of the Subcommittee on Internships and Formal Education in Hospital Pharmacy. The first area of concern to this Committee was the position the SOCIETY would take relative to the pre-professional educational program proposed for pharmacy. During the meeting of the House of Delegates at the 1954 meeting a resolution was passed endorsing the pre-professional educational program sponsored by the profession in general and copies of the resolution were forwarded to the A.Ph.A., A.A.C.P. and the N.A.B.P.

As concerns the Intern Guidance Manual, the concensus of opinion of

directors of internship programs in hospital pharmacy is that though such a manual is desirable, it is not essential to a satisfactory and adequate internship program. The Committee is of the opinion that the Flack-Dodds manual is an excellent piece of work, is most helpful to many establishing a program for the first time as well as to those who have operated a program in the past and should be studied further by the new Committee, with comments from those program directors who have agreed to utilize the manual and propose constructive criticisms for its revision.

A simplified check list for Accreditation of Internship Programs is presented herewith by the Committee for the consideration of the SOCIETY.[1]

The matter of inspection and accreditation of hospital pharmacy internships was brought up at the Executive Committee Meeting in February at which time the recommendation was that the Executive Committee refer the matter of accreditation to the Policy Committee of the Division of Hospital Pharmacy of A.Ph.A. and ASHP who shall devise the method and work up the requirements.

As concerns the 1951 Proposed Syllabus for the Course in Hospital Pharmacy Administration, the Committee was unable to accomplish any satisfactory revision. It is recommended that this matter be a continuing study by the Committee, reviewing and revising and making recommendations as to how its use may further the program and be implemented into a pharmaceutical curriculum in cooperation with the pharmaceutical educators.[2]

As chairman of the Committee on Minimum Standards I would like to take this opportunity to express my appreciation for a "job well done" by members of this Committee both collectively as well as individually. The subcommittee chairmen, Mr. Bowles and Sister Marian, have most effectively coordinated your thoughts into a well organized composite, this report. We feel that we were not able to complete all projects as thoroughly as we would have liked, as the short "Society Year" did not permit sufficient time. In closing I would like to express my sincerest thanks to each member and to the chairmen for the fine cooperation given me.

1. EDITOR'S NOTE: In view of the fact that the Policy Committee of the Division of Hospital Pharmacy has proceeded with a plan for evaluation of internships in hospital pharmacy, the check list is being referred to a special committee concerned with the evaluation program. Consideration will be given to the check list presented by the Committee on Minimum Standards when the questionnaire is again reviewed.

2. EDITOR'S NOTE: The Syllabus is published on page 261 of the May-June (1955) issue of THE BULLETIN.

Supplemental Report from the Subcommittee on Minimum Standards

Forms and Systems: The Subcommittee recommends, after due deliberation, that the SOCIETY seriously consider making available to hospitals a form and supply system service; and that the new Committee on Minimum Standards study not only the forms, systems and reports submitted as an attachment to this report, but also other systems, with the purpose of arriving at a standard system of reports, forms and records flexible enough to meet the needs of individual hospitals. The Committee further recommends, in connection with systems, that the narcotic rules, regulations and suggestions developed by previous committees, under the direction of A. W. Dodds, Milton W. Skolaut, V. O. Trygstad and Sister M. Etheldreda, be printed on cards and made available, upon request, to all hospitals, as a special service of the SOCIETY. It is our opinion that the Bureau of Narcotics would welcome such a service.

Containers and Labels: The Subcommittee recommends the following with regard to ward and prescription containers:

I. Ward Containers
   - A. Should be of amber glass
   - B. Should be of uniform shape within certain categories, e.g.
     1. Inpatient medication
     2. Outpatient medication
     3. Internal liquids
     4. External liquids
     5. Tablets and capsules
     6. Ointments
   - C. Labels should show
     1. Name and address of hospital (This committee feels that this is of prime importance)
     2. Generic name of drug
     3. Strength in both metric and apothecary system
   - D. Labels should bear a protective coating and immediately be replaced on showing signs of wear or soil

II. Prescription Containers
   - A. Should be of amber glass
   - B. Labels should show
     1. Name and address of hospital
     2. Full name of patient
     3. Other usual information, e.g., number, date, directions, prescriber and compounder's initials.

Basic Ingredient Control: The Subcommittee studied the subject of basic ingredient control and decided that, while this control exists, it exists to a fairly limited degree and is not too serious a problem to the profession at this time. However, recognizing the dangers inherent in any policy that restricts the freedom of the physician in prescribing varying strengths and dosages, the Committee recommends that the SOCIETY go on record as being opposed to such restrictions in the interest of better patient care, and that the secretary be instructed to notify pharmaceutical manufacturers pursuing such a policy as to the feeling of the SOCIETY in this matter.

Text Lists: It is the considered opinion of the members of this Subcommittee that the "Guide to Information Sources for the Hospital Pharmacists," compiled by Miss Gloria Niemeyer and presented at the Institute held in Storrs, Connecticut, in June 1954, is thoroughly adequate as a text list and could not be improved upon at this time.

Report of the Committee on Program and Public Relations

PAUL F. PARKER, *Chairman*

The Committee on Program and Public Relations was composed of the following persons: Norman Baker, John Gooch, Jack Heard, Lee M. Neidlinger, Lillian Price, W. Arthur Purdum, Sister M. Ancilla, Sister M. Franciscana, Don Skauen, Milton Skolaut, William Slabodnick, and Jerome Yalon. The Committee met in Boston in August, 1954, during the Convention. During the year a series of duplicated correspondence has been used to coordinate the activities of the Committee.

The early work of the Committee concerned the assimilation of program suggestions and general program themes. All members are to be commended for their unusual interest; and as a result we have accumulated a rather large number of topics to be discussed in programs during 1955. These programs include the one to be presented here in Miami this week, the Institute to be presented at the University of Chicago in June, and the Institute to be presented at Emory University, Georgia, in August. A number of the remaining suggestions were mimeographed for presentation at the House of Delegates' meeting yesterday afternoon. This was for the purpose of providing suggestions for use in the local branches as needed.

The Committee was active in obtaining hospital pharmacists to operate the display of the Division of Hospital Pharmacy at the American Hospital As-

sociation Convention in Chicago in September. We have also been aware of, and interested in, a number of outstanding programs on hospital pharmacy during the year; however, we have not participated in the arrangement of such programs. These included the Association of Military Surgeons in Washington in December; the Pan-American Congress of Pharmacy, San Paulo, Brazil, in December; the American Association for the Advancement of Science in California in December; and several other regional hospital pharmacy meetings.

Other Committee assignments included investigation of the possibility of establishing a pharmacy section at the annual convention of the American Hospital Association. After discussion with the Executive Committee it was decided that this assignment was not applicable to the activity of our committee. Further, we were asked to establish an award similar to the Remington Medal for presentation to outstanding hospital pharmacists. This work has not been completed and we suggest investigation of this problem by the committee for next year.

The establishment of scholarships for graduate study in hospital pharmacy administration has been discussed and at a recent Executive Committee meeting it was decided that the Society would approve no scholarships in hospital pharmacy except those received through the medium of a Scholarship Committee of the ASHP, this committee to be elected by the Executive Committee upon the recommendation of the Planning and Advisory Committee. The Scholarship Committee would be authorized to establish all conditions relative to administering scholarships in hospital pharmacy. It is anticipated that further action will be taken on this recommendation at this Convention and that scholarships in the future will be handled by such a committee.

Two other assignments included the drafting of a code of ethics applicable to hospital pharmacists and the advisability of hospital pharmacy participation in studies of the cost of hospital care. It seems that these two topics are too broad in nature to be included among program activities. It is suggested that the incoming president re-assign these topics if it is deemed advisable.

Regarding the advisability of extending the definition of a hospital pharmacist to include those practicing in diagnostic centers, the Committee on Program and Public Relations recommends that this subject be referred to the Committee on Constitution and By-Laws.

Considerable time and thought has been directed toward the matter of public relations. A tentative program on public relations for the Society has been drawn up by the Committee in cooperation with Mr. Lawrence McCracken of the public relations firm of Dudley, Anderson and Yutzy. The services of this public relations firm were made available to us through the courtesy of Lederle Laboratories. Mr. McCracken will discuss this program in his presentation at this meeting and the Committee recommends that action be taken to provide for continuing a public relations program on a long term basis. Many aspects of a public relations program can best be accomplished through the Society. To this end, it is imperative that some person or group of persons be responsible for a public relations program under the direct supervision of the Executive Committee.

At the present time a career booklet is being prepared with the cooperation of the public relations firm. To obtain factual data regarding careers in hospital pharmacy a survey is being made through the Industrial Relations Center of the University of Chicago among hospital pharmacists who presently pursue such a career. This booklet will be published by the Society in cooperation with The Bulletin and its editorial staff.

Assuming the establishment of some permanent continuing public relations committee within the Society, the Lederle Laboratories has agreed to (1) revise and evaluate a public relations program for the Society on an approximately 10-year basis, using the present outline as a starting point until a satisfactory program can be obtained for the Society; and (2) assist in the accomplishment of any specific public relations projects which can best be obtained through a public relations firm and which are not excessively time-consuming.

Recommendations

1. Re-assignment of the project to establish an award for hospital pharmacists.

2. Establishment of a Scholarship Committee.

3. Referral of the problem concerning the definition of a hospital pharmacist to include those practicing in diagnostic centers to the Committee on Constitution and By-Laws.

4. Provide immediately for implementing a public relations program both in the Society and through the public relations firm of Dudley, Anderson and Yutzy as offered by Lederle Laboratories.

Report of the Committee on Pharmacists in Government Services

CHARLES G. TOWNE, *Chairman*

The Committee on Pharmacists in Government Services was confronted this term principally with the problems of reviewing and evaluating its importance to the Society and those members for whom it particularly functions, government pharmacists. The president's message and early directives, and later the Executive Committee, asked for clarification and interpretation of these functions. Coordination with the Planning and Advisory Committee was required. Accordingly, recommendations are submitted with each problem.

During this term, other problems were: (1) Accreditation of G. I. training; (2) Status of pharmacists in National Guard Evacuation Hospitals; (3) Army hospital pharmacy; (4) Letters to government services volunteering advisory aid of the Committee and Society; and (5) Extension of aid to state, county and city hospital pharmacy.

Activities of this Committee were dependent upon exchange of correspondence. Distances prevented formal meetings.

Before considering the Committee structure and functions, it is necessary to review government hospital pharmacy. Within the A.Ph.A. and Society, "government" has generally referred to "Federal Government." In hospital terminology and classification—and more logically—"government" hospitals include federal, state, county, and city. Federal hospitals are those of the Veterans Administration, Public Health Service, Indian Service, and the branches of the armed forces.

Our first concern should be for "the patients." Of all the patients in the United States, 70 per cent are in governmental hospitals, mostly on long term care. Here also the vast majority of outpatients are treated. The services of a hospital pharmacist are available in a higher percentage in government hospitals than in private institutions; also, the number of patients per pharmacist is considerably higher. Most patients are on a "dependent" status, requiring specialized employee-patient relations. The problems of the government hospital pharmacist are in variance and contrast in many ways with accepted routine hospital pharmacy practice. Medications on limited supply lists or stricter formulary and control procedures, and their dispensing and bulk compounding; budget control and procurement through channels; and administration and public

and trade relations; all require specialized training and careful application of tact and censure particular to governmental operations.

Hospital pharmacy, in several branches of the federal government, has shown remarkable progress. The achievements of very progressive leadership and administration at the central level of administration by capable pharmacists have raised the standards of government hospital pharmacy second to none in some services. The Public Health Service and Veterans Administration are particularly to be commended. Formalized teaching and training has been introduced. The larger research institutions of the armed services, such as Bethesda and Walter Reed Hospitals, are keeping pace. The Indian Service is currently reorganizing, and promises of extended and improved hospital pharmacy is indicated. This is just a beginning. Further extension of these activities through cooperation with the Society is a prime function of this Committee. The Society, through its cooperation and raising of hospital pharmacy to its current high status, has contributed much to this progress, but it must continue to make these services available to ever increasing extents. Progress in state, county, and city hospitals is sporadic. Through local chapters the Society and this Committee can render further aid and incentives.

The governmental services and individual pharmacists are limited in freedom of action by policies of governmental nature. A place is needed where government pharmacists and services can voice their problems or coordinate and exchange ideas and opinions. Within a committee of government pharmacists many matters can be tactfully screened and handled or referred for the best interest of the individual, the service, and the Society. Through fair representation of all services and earned respect by authorities of the services, many of the problems can be directly solved with tact and decorum. Other problems of an overlapping nature, or beyond the functions of the Committee after screening, can be referred through the Society and A.Ph.A. with the advice and consultation afforded by the Committee's further coordination. Failure of the Society to provide this service to its members could lead to professional pharmaceutical problems being referred to lay organizations interested in the welfare of all governmental employees in general.

Certain trends in current surveys that may initiate legislation may severely affect government and hospital pharmacy. Here the advisory capacity of this Committee could be of inestimable value.

Recommendation

1. State, county, and city hospitals should be represented by one or more members; this delegation to be principally concerned with advisory capacity of their problems direct to members or through local committees or chapters.

2. Non-governmental membership. Preferably two, at least one, non-governmental appointee, chosen for stature and knowledge of problems particular to government hospital pharmacy, should be jointly members of this Committee and the A.Ph.A. representatives on the Committee for Status of Pharmacists in Government Service.

3. Functions of this Committee should be extended, authorizing the advisory, and expanding the recommending, capacities. Further studies are recommended for clarification of channels of authority through which major problems of inter-service nature should be referred.

With regard to the relationship of this Committee and the Society to the Committee on Status of Pharmacists in Government Service, it is apparent that at present there is inadequate liaison between them and vague understanding of functions. The Status Committee is a group represented by four pharmacy organizations: The American Pharmaceutical Association, the National Association of Retail Druggists, the American Association of Colleges of Pharmacy, and the National Association of Boards of Pharmacy. A review of this committee has been extensively and kindly rendered by Dr. Robert P. Fischelis, secretary of the A.Ph.A. Prominent members of the four pharmacy organizations are to serve the interest of "status," to further the fair recognition of pharmacy as a profession, contributing toward the commissioning of pharmacists in the armed forces and toward the advancement of both position and salary of pharmacists in government service. This group is not concerned with problems of standards of pharmacy practice as is this Committee and the Society, and its membership is not representative of government hospital pharmacists or services.

It is apparent therefore that there is little or no overlapping of the functions of the two groups. However, since problems of status concern government hospital pharmacists in a larger proportion and number than any other field of government pharmacy, our specialty should be adequately represented. Policywise, a government pharmacist should not serve on this committee of such political significance. The above membership of non-governmental hospital pharmacists, serving jointly as liaison and in the interest of the Society Committee, is significantly recommended. A further aim of the Society should be for equal representation with the above groups.

Studies to alter the name of the Society Committee to more clearly distinguish it from the Status Committee and to define it in reference to government "pharmacy" rather than "pharmacist" are urged.

A major problem of this year's Committee has been to establish the need of accreditation of hospitals in order for veterans to be eligible for veterans training privileges while interning or in residency. This particularly applies to pharmacists in some government services. Coordination with the educational committee was rendered. Meetings with the Veterans Administration were held, and channels of procedure were determined and recommended to the Society and concerned committees. The first step was to establish a procedure of accreditation. This is being accomplished through the A.Ph.A. Division of Hospital Pharmacy, and the Policy Committee is commended for this year's progress. Additional liaison and the establishment of necessary standards for recognition of the Division as the accrediting agency should be further acted upon by the Society.

The lack of commission status for pharmacists in the Table of Organizations for 750-bed Evacuation Hospitals of the National Guard was referred through channels to the Committee on Status of Pharmacists in Government Service. In liaison with the Society's member there had been no meeting or correspondence.

Of particular concern this term is the standard of hospital pharmacy practice in Army hospitals. Individual efforts of the Army member of this Committee in recommending organizational procedures, reflected keen insight and understanding, and are highly endorsed and commended. Dr. Fischelis kindly arranged an authoritative interview and report. Concern was expressed that the Army's pharmacy services are not on a level with the high standards of its medical service, but noted efforts are being made in this direction. The full facilities of this Committee and Society were offered in cooperation. Arrangements are pending with other government services having hospital pharmacy teaching facilities to effect the training of Army hospital pharmacists.

Letters are being submitted to the directors of various governmental services, offering the services of this Committee in an advisory capacity, backed by the facilities of the Society. Direct personal offers in conferences by the chairman have also been extended. Similar letters are recommended for submission direct to chief pharmacists where the need is

known or where information has been requested, and further publicity through THE BULLETIN and Journal is urged. These letters and publicity should particularly reach city, county, and state hospitals and their pharmacy service directors. Letters and publicity encouraging government pharmacy activity at the local and chapter levels should be a further project.

Several matters of clarification are referred to the next Committee; among them, further defining of functions and limits of activities. For example, concerning pharmacists in government services on duties borderline to hospital pharmacy such as supply, clinics, and field operations.

In terminating this year's activities, President Archambault is to be commended for his untiring efforts in the interest of this Committee's activities. Miss Niemeyer and Dr. Fischelis also rendered assistance, without which little progress could have been accomplished.

Report of the Committee to Study the Role of the Pharmacist in Small Hospitals

THOMAS FOSTER, *Chairman*

At the fourth and final session of the SOCIETY's Annual Meeting held in Boston last year, a resolution was passed urging that efforts be intensified to collect data which would further implement a program for improving the practice of pharmacy in hospitals.

President Archambault appointed the following Committee to consider the work: Thomas A. Foster, Chairman; John Boenigk; Mydras Brewer; Sister M. Franciscana; K. L. Kaufman; Alex Milne; and Oliver Steppig.

To consider the survey proposal of Dr. J. R. McGibony of the University of Pittsburgh School of Public Health mentioned in the Committee report given at the Boston meeting, a meeting was held in Washington on October 30, 1954. Present at the conference were: Dr. Robert P. Fischelis, Dr. Don Francke, Dr. George Archambault, Miss Gloria Niemeyer and Mr. Foster. The proposal was reviewed in detail, and Dr. McGibony agreed to incorporate the suggestions and resubmit to all members of the group.

The corrected proposal was returned on November 15 and it was understood from Dr. Fischelis that this final proposal would be considered by the Policy Committee of the Division of Hospital Pharmacy at its next meeting.

This meeting was held in Washington, D. C. on Sunday, February 27, 1955, with the following members present: G. F. Archambault, Grover C. Bowles, and Don E. Francke representing the ASHP; Robert P. Fischelis and Glenn L. Jenkins representing the American Pharmaceutical Association; Dr. Robert Cadmus representing the American Hospital Association; and Sister Mary Stephanina representing the Catholic Hospital Association. Claude Busick, president-elect of the ASHP was present by invitation. Miss Gloria Niemeyer, assistant director of the Division of Hospital Pharmacy was also present.

The Policy Committee agreed on the following statement summarizing its thinking on the proposed survey:

"The Policy Committee has given careful consideration to the necessity for further and continuing study of hospital pharmacy services as a basic requirement for the development of standards of practice and has come to the following conclusions:

"1. The Minimum Standards for Pharmacies in Hospitals as fostered by the Division have had general acceptance.

"2. A survey to determine operational performance on the basis of these standards is timely.

"3. Initiative on the part of Dr. McGibony in promoting the survey through his connections, along the lines of the proposal submitted, as amended, would have the approval of the Division and the cooperation of its Policy Committee and staff."

It is the understanding of your chairman that Dr. McGibony has been notified to go ahead with his plans for financing the survey and when completed to submit them to the Division for final approval.

Recommendations

In consideration of the present status of the proposed study of hospital pharmacy services, thought should possibly be given to the continuation of the Committee for another year.

Report of the Committee on Special Projects

ROBERT BOGASH, *Chairman*

Though burdened with a short calendar but long work year, the members of the Committee on Special Projects responded handsomely and performed in yeoman-like fashion. Because of their collective response in an abnormal SOCIETY year, I should like to reverse the standard procedure in presenting a report and first express my sincere appreciation to each individual member of the Committee for his efforts and cooperation. It is their collective effort that I have summarized for your attention.

The Committee on Special Projects attempted to stay on the same track laid by the previous year's committee, that is, to encourage the study of current problems and subjects of importance to the practice of hospital pharmacy through the affiliated chapters of the ASHP and to coordinate these projects on a national basis.

The initial suggestion made was that the territorial map of the country be subdivided in proportionate sections and that each committee member be assigned one subdivision. Each committee member would then correspond with the affiliated chapter in his or her sectional area in an attempt to elicit opinions and comments regarding project committee work on the local level. Secondarily, it was felt that the Special Projects Committee member could aid in correlating various special projects and keeping alive those projects already existing in his particular area.

While the above plan was considered sound for any normal year, it was felt that time and poor geographical location of the present Committee would be detrimental to its functional operation. Instead, the Committee functioned as best it could by making as many contacts as possible in our individual areas throughout the country. This was all time would allow.

Through frequent contact and correspondence with the local groups, the Committee was able to cull some forty suggested projects submitted for consideration. Of the forty suggested projects, twenty-three were selected and returned to the individual Committee members in the form of a master list for their thoughts, criticisms and comment. Of the master list group, four suggested projects enjoyed the position, by consensus, of being either new or worthy of the attention of the Executive Committee. Submitted herewith is a copy of the master list and the particular projects earmarked for the Executive Committee. It is suggested that the incoming committee consider the following:

1. To continue to correspond with as many affiliated chapters as possible with particular reference to those chapters which are either actively engaged in a project or have named project committees. It is further suggested that this correspondence be undertaken in a planned fashion to insure maximal coverage on a geographical basis.

2. To continue attempts to elicit responses from those chapters which have

not responded as yet to Committee correspondence.

3. To consider, perhaps as an assigned project, compiling suggestions offered over the past few years in an outline or master list form. This form could then be made available to local chapters which have experienced some difficulty in initiating a first project. It would also make local chapters aware of what problems and thoughts are present in other areas of the country.

4. To consider the value of the "pilfered-from-Paul-Parker's plan," that is, dividing the map into sectional areas and allocating one section to each member of the Committee on Special Projects.

Finally, it is suggested that when feasible, the future members of this Committee be selected with secondary attention to their geographic distribution. Such a routine procedure would place Committee members in key areas with which they would, in the main, be familiar. The individual member would be cognizant of problems and issues peculiar to that area and could correspond with relative understanding with the local chapters. This would, I believe, help the flow of correspondence between the local affiliates and the national Committee and, within a short period of time, make available a smoother functioning Special Projects Committee that could be more closely attuned to the problems of the local chapters.

I should like to take this opportunity to offer my sincere thanks to Paul Parker for aid and advice throughout the year.

Committee on Special Projects: Robert Bogash, *Chairman*, Carl H. Brown, Johnnie Crotwell, Salvatore Gasdia, Ludwig Pesa, Sister M. Bernadette, Rex West.

Report of the Committee on Historical Records

ALEX BERMAN, *Chairman*

Activities of the Committee during the preceding year have been focused on assembling histories of all affiliated Society chapters. It was felt that a permanent record of the origin, growth, and contributions of all local hospital pharmacy organizations would materially enrich the Society's archival collections.

It is with pleasure that the Committee acknowledges receipt thus far of the following eleven manuscripts:

1. Elvera H. Dressler, St. Francis Hospital: (History of the Illinois Chapter of the American Society of Hospital Pharmacists).

2. Ida Kado and Kikuyo Munemori: History of the Southern California Society of Hospital Pharmacists.

3. Mary Morgan, Children's Hospital: History of Akron Area Society of Hospital Pharmacists.

4. Adela Schneider, Southern Pacific Hospital: History of the Texas Society of Hospital Pharmacists 1949-1955.

5. Sister Mary Blanche, Sacred Heart Sanitarium: (History of the) Wisconsin Society of Hospital Pharmacists.

6. Benjamin Teplitsky, Veterans Administration Hospital, Albany, N.Y.: Historical Sketch of the Northeastern New York Society of Hospital Pharmacists.

7. Fannie Wasserman, Kensington Hospital, Philadelphia: Philadelphia Hospital Pharmacists' Association, History of this Association.

8. Jeanne Sickafoose, Aultman Hospital, Canton, Ohio: Organizational History of Hospital Pharmacy (Prepared for presentation to students).

9. Doris Hawkins: History of the Arizona Society of Hospital Pharmacists.

10. Wanda Lee Teakell: History and Summary of Activities of the Oklahoma Society of Hospital Pharmacists.

11. Lena C. Jacobs: History of the New Jersey Society of Hospital Pharmacists.

It will be recalled that last year the American Institute of the History of Pharmacy offered an award of two gift memberships to the two hospital pharmacists who made the most noteworthy historical contribution, prior to the Society's 1955 Annual Meeting. (See The Bulletin 11:356, Sept.-Oct., 1954). Accordingly, the Committee recommends that the awards of two-year gift memberships to the A.I.H.P. be granted to Miss Adela Schneider, Southern Pacific Hospital, Houston, Texas, and to Sister Mary Blanche, Sacred Heart Sanitarium, Milwaukee, Wisconsin, for outstanding histories of their respective local hospital pharmacy organizations.

The Committee takes this opportunity to thank all who have cooperated so ably in this continuing project, and hopes that the other chapters will be able to forward their histories in the near future.

**Since only the first six manuscripts were received in time to be considered in this year's competition, the additional five will be considered during the coming year.*

Committee on Historical Records: Alex Berman, *Chairman*, Robert Cathcart, Walter Frazier, Leo Godley, Raymond Kinsey, Hazel Landeen, Gloria Niemeyer, and I. Thomas Reamer.

Report of the Committee on Spirituous Liquors and Other Security and Control Type Narcotics, Hynotics, Ethyl Alcohol Medications

SISTER M. ETHELDREDA, F.S.S.J., *Chairman*

The first task of this Committee was to submit to Miss Niemeyer suggestions on how she should handle an article titled "Illegal Use of Tax-Free Alcohol" which appeared in an *N.A.R.D. Journal, 76*: No. 13, p. 8, 1954, and inferred, in part, that hospital pharmacies use tax-free alcohol in compounding prescriptions for private patients of physicians in private practice who have offices in the hospital, and in so doing, violate the Internal Revenue code Section 3108 (c). The Committee members made the following comments: Miss Niemeyer should write a letter to the Executive Secretary of the Philadelphia Association of Retail Druggists pointing out:

1. The Society's stand on the filling of outpatient prescriptions in hospital pharmacies as restated in the past year's resolutions.

2. Hospital pharmacies, as a whole, are aware of Section 3108 (c) and have taken this into consideration. They buy preparations for outpatients' use which contain alcohol or buy tax-paid alcohol and then obtain manufacturer's rebate.

3. Appropriately express that there are some hospital pharmacists, as well as retail pharmacists, who will break laws.

As a service to and a guidance for our membership, the Committee helped compile a list of specific tax-free alcohol uses and restrictions on uses in hospitals. Form 1447—the Application and Basic Permit Form to use Alcohol Free of Tax—requires a statement as to the purposes for which the alcohol will be used. This must be spelled out in detail and not in general terms. The following are some uses of tax-free alcohol which is furnished without charge to patients and and not for resale:

- Manufacture of galenicals and other pharmaceutical preparations
- Compounding prescriptions
- Laboratory use—dehydrating tissues, preserving specimens, etc.
- Preoperative preparation of patients
- Disinfections of hands in surgery and obstetrics
- Sterilization of instruments
- Cleansing and disinfection of skin prior to injection

Preparation of rubbing alcohol and lotion

For use in alcohol lamps

Test solution for gastric analysis testing

Restrictions: Tax-free alcohol must not be used in the preparation of condiments, culinary extracts, flavoring, or other preparations used in food products, or in food products in any manner, and under no circumstances shall such alcohol be used for beverage purposes or in any product which may be so used. Thus the use of tax-free alcohol in the making of vanilla, lemon, maple, or similar flavoring extracts for the dietetic department is not allowed by law.

Medications prepared with tax-free alcohol cannot be sold to any person.

Another objective of the Committee was to check with the Internal Revenue for recent amendments in Federal Alcohol Regulations as related to hospital pharmacy use. One of the members checked the Federal Register and found that the only recent notices of amendment, or proposed rule making, apply to industrial plants and would be of little interest to hospital pharmacists. According to Title 26, Code of Federal Regulations which appeared in the Federal Register for December 31, 1954, all hospitals, profit or non-profit, and all non-profit clinics may procure and use tax-free alcohol.

Mr. Vernon O. Trygstad who delved into this problem suggested that the incoming Committee look into possibilities for use of specially denatured alcohol for manufacturing purposes by the institutions which do not qualify for use of tax-free alcohol.

Mr. Arthur W. Dodds, another Committee member, pointed out an interpretation on the use of tax-free alcohol in outpatient clinics as stated by Dwight E. Avis, Director, Alcohol and Tobacco Tax Division, Treasury Department, which appeared in the March 25, 1955 issue of "Secretary's Newsletter" of the F.A.C.A. The statement . . . "The making of a nominal admission charge to such outpatients would indirectly constitute a charge for the medicines, even though no specific charge was made therefor, and would preclude the furnishings of such medicine prepared with tax-free alcohol under the statute," seems variable in its implication, and Mr. Dodds recommended that the next year's Committee investigate this problem in line with its activities.

The Committee attempted to follow up the Narcotic Regulations as drawn up by the previous Committee with the possibility of approval by the U. S. Treasury. Mr. Dodds tried to arrange for a conference with Mr. Alfred Tennyson of the Narcotic Bureau but was unable to meet with him to this date. Mr. Dodds, however, pointed out a mis-statement on page 485 of THE BULLETIN (1952) in paragraph 2—"Standing and p.r.n. orders." It should read only "p.r.n. orders." It is believed that a "standing order" is one which may be given routinely for a certain doctor, such as, a preoperative medication. Mr. Dodds stated that when he previously visited with Mr. Tennyson, he was informed that the Bureau could not permit a standing order for narcotics.

In a review of the Federal Marihuana Law, Sister Rebecca communicated with C. W. Cunningham, Acting Commissioner of Narcotics. In this correspondence, Mr. Cunningham stated: "As a practical matter hospitals are not concerned with the Federal Marihuana Law because although the Marihuana Act recognizes its use by authorized prescribing by registered physicians and dispensing on prescriptions, by registered pharmacists, the need for cannabis extracts in medicine has disappeared; the drug has been omitted from the later editions of the U.S.P.; there has been no lawful manufacture of cannabis extracts; and aside from some limited scientific research projects, the only modern use of the flowering tops and foliage of the plant seems to be confined to abusive use, i.e., smoking."

The Committee had in mind a few other objectives which, unfortunately, due to the short year it was unable to follow through.

***Committee on Narcotic, Hypnotic, Ethyl Alcohol, Spirituous Liquors and Other Security and Control Type Medication*: Sister Mary Etheldreda, *Chairman*, Arthur W. Dodds, Ruth Pully, Sister M. Rebecca, Vernon Trygstad, Joseph Shibel, Geraldine Stockert.**

Report of the Committee on Disaster Preparedness

LUDWIG PESA, *Chairman*

The Committee this year, has studied some of the initial situations which may confront the hospital pharmacist in servicing the medical after-phase of explosion, fire and other accidents of a catastrophic nature.

By way of four basic assumptions, the Committee will present these situations and suggest fundamental pre-planning measures. The development of this phase of preparedness planning and subsequent detail should be done in conformity with the hospital's general plan for disaster relief.

1. *Time of Disaster Incidence*: The nature of disaster dictates that it may occur at any hour of day or night. Thus there exists a more than 50 percent possibility that it may happen when most pharmacy personnel is absent. With this in mind it would appear wise to organize a temporary drug distributing team from responsible hospital people who actually live in or occupy night and early a.m. positions. The arrival of regular pharmacy personnel would free this temporary team for other duties. While it appears unwise to entrust pharmaceutical distribution to non-pharmacists, it must be realized that catastrophe creates situations which are not amenable to normal rules.

This temporary operation could very well be regarded as a "pharmaceutical first aid."

2. *Failure of Communications*: The possibility of failure or disruption of telephone service affecting the hospital's incoming and outgoing communications must be recognized. As an alternative to inability to summon the pharmacy staff by telephone, a predetermined understanding should be established whereby personnel would report to the pharmacy upon being made aware that disaster has occurred or is impending.

From previous disaster experiences it has been learned that a curious or anxious public may create vehicular congestion in the thoroughfares leading to the hospital. A means of identification, such as a card, sticker or banner bearing the word "HOSPITAL" in large print, prominently displayed on the pharmacist's transporting vehicle will aid in enlisting traffic police assistance for hastening travel to the hospital.

In the event of switchboard and extensions failure or overload, a messenger service will be pressed into action for "in communication."

Hospital pharmacists should be alert to advantageously utilizing these people for drug delivery in the return phase of this service.

3. *Expansion of Pharmacy Function*: The hospital Pharmacy's existing functions may have to be increased up to a five fold expansion in order to properly service the casualty load. To accomplish this in terms of personnel, a survey of uncommitted pharmacy skill in the surrounding areas should be tabulated. Retail pharmacists and pharmaceutical salesmen are good sources for recruitment.

4. *Replenishment of Pharmacy Supplies*: The expanded service of the Pharmacy in meeting disaster demands will create a need for pre-assured sources of supplemental supplies.

A standing order for replacement items in anticipated volume should be established with local wholesale distributors and nearby pharmaceutical manu-

facturing houses. Retail pharmacy can also contribute in this operation.

In civil defense planning most states have or are in the process of accumulating a large quantity of medical supplies under the Federal Civil Defense matching fund program. This is stored in local areas for quick availability.

The Federal government is stockpiling medical supplies in strategically located warehouses outside critical bomb target areas. This back-up supply is also primed for ready availability.

In this phase of preparedness the hospital pharmacist must pre-allocate areas and organize personnel for storage of incoming supplies.

The Committee has generalized in using the terms, disaster and catastrophe, to include any accident involving a large number of casualties. In the event of H-Bomb attack, there exists the appalling assumption that most, if not all, of the hospitals in the immediate target area would be destroyed. Hospitals in outlying areas would be incapacitated in varying degrees by "fallout" radiation.

The major part of an H-Bomb casualty load would be absorbed by improvised hospitals and by organized hospitals well outside the bombed areas.

Committee on Disaster Preparedness: Ludwig Pesa, *Chairman*, Henry Beard, Victor Caniapi, Evelyn Carlin, Frank E. Dondero, Alexander Knight, Ernest Simnacher, Eddie Wolfe.

Report of the Committee on Pharmacy Operated Central Sterile Supply

MILTON W. SKOLAUT, *Chairman*

Following the recommendations outlined in the Address of the President-elect at the Boston meeting of the ASHP, the Committee met to study this centralized service for possible inclusion in the pharmacy program. The members of the Committee are as follows: W. Arthur Purdum; Herbert L. Flack; Sister Mary John; Claude Paoloni; and Joseph Salvino. It is interesting to note that all members are operating a Central Sterile Supply Service as an integral part of the Pharmacy with the exception of Mr. Herbert Flack. However, Mr. Flack is performing, through his Pharmacy, several of the services which normally fall in a centralized Sterile Supply Service.

The Committee considered methods to include in Pharmacy such a service. Pharmacy could operate the Sterile Supply Service as part of the Pharmacy Department or service, or Pharmacy could merely supervise or control these activities. A consensus of the Committee was that Pharmacy should actually be capable of operating such a service. A pharmacist will be more capable of supervising and controlling this added service if he is familiar with basic operational functions.

Since this was a new Committee, and a short term, the Committee members tried to decide upon a method of approach. The first course of action was to draw up a preliminary draft of a college course to instruct students, on an elective basis, on the requirements to operate this service. The second was to write a series of articles to be published in hospital pharmacy periodicals to help and assist pharmacists to plan and set up such a service. Due to the short term, the series of articles was not written, but the preliminary course outline was drafted and corrections are being made. Several members of the Committee consulted their deans of pharmacy colleges on an informal basis and obtained their reaction to such a course. All members reported that the deans thought the course outlined was well planned and they would consider including such a course in 1960, or before, when the pharmacy colleges move to a five year program.

The preliminary syllabus for a course in the pharmacy colleges is not ready for release and should not be publicized at the present time. However, the new committee should be able to complete and offer it for adoption through proper professional channels.

One of the biggest questions the colleges of pharmacy may ask is: "Who is to teach such a course?" Colleges of pharmacy are lacking properly qualified staff at present. The Committee should be ready to assist in recommending qualified persons as instructors. The Committee felt that laboratory work should be included in addition to the lecture course. This is not insurmountable where the colleges are closely situated to hospitals.

Information in this report is rather meagre since it is a progress report. The Committee feels that final adoption and results will probably not be realized for three to four years. Following the recommendation of the president, as to what position the SOCIETY would take in this matter, we, the Committee members have the following to offer: The feeling is that the time has now approached when such training is becoming more and more imperative. There is a definite trend into this combination and for this reason pharmacists should be ready, eager and willing to assume responsibility for such a new and combined program.

This may require supplementary training for hospital pharmacists. However, as a result, pharmacy will broaden its professional base by assuming this additional function.

It is felt that this SOCIETY should offer help to pharmacists through information and instructional programs in the colleges of pharmacy.

Recommendations

1. It is recommended that this Committee be reappointed annually until this task is completed.

2. The Committee membership should remain intact except for the addition of new and interested members.

3. Older members should be retained to insure continuity of this Committee to make it an active functional part of the SOCIETY.

4. Chairmen of this Committee should be selected from the experienced members.

5. It is further recommended that the syllabus be completed and presented to the American Association of Colleges of Pharmacy through professional channels with a recommendation that it be included in their program as soon as possible.

6. Also, the Committee should recommend to the colleges of pharmacy, personnel who could teach such a course successfully.

7. It is further recommended that the Committee contact and develop satisfactory working relationships and liaison with the several nursing associations of the U. S., namely, the American Nurses Association and the National League of Nursing. It is essential that these associations be kept informed in order to obtain their wholehearted support.

Report of the Committee on International Hospital Pharmacy Activities 1955

DON E. FRANCKE, *Chairman*

Since the last meeting of the SOCIETY the Committee on International Hospital Pharmacy Activities has worked to encourage participation by hospital and other pharmacists in the Third Pan-American Congress of Pharmacy held in Sao Paulo, Brazil, December 1-8, 1954. At present your Committee is making plans for American participation in the 16th General Assembly of the International Pharmaceutical Federation which is to be held in London, September 19-23, 1955, and the British Pharma-

ceutical Conference scheduled for Aberdeen, Scotland, August 29 to September 2, 1955.

Pan-American Congress

Five members of the SOCIETY participated in the Pan-American Congress of Pharmacy in Brazil. A total of five papers were presented by hospital pharmacists making up the American delegation. The papers of two authors who could not personally attend the meeting were presented by other members of the American Delegation.

Representing the SOCIETY at the Congress in Brazil were Lt. Colonel H. Dale Roth, Mrs. Anna C. Richards, and Dr. Don E. Francke. Papers were also prepared and presented in absentia by ASHP President Dr. George F. Archambault and Mr. Frank J. Steele. Dr. Francke also served as Secretary of the A.Ph.A. delegation to the Congress. The A.Ph.A. delegation was headed by President Jack B. Heinz of Salt Lake City. A total of ten individuals made up the American Delegation.

A summary of the Pan-American Congress of Pharmacy was presented in THE BULLETIN 12:39 (Jan.-Feb.) 1955, and those interested in further details may refer to this article.

International Pharmaceutical Federation

An article describing the general program of the 16th General Assembly of the International Pharmaceutical Federation appears in the March-April, 1955 issue of THE BULLETIN.

1957 International Meeting in U.S.

The Fourth Pan-American Congress of Pharmacy will be held in the United States in the Fall of 1957. Thus the SOCIETY will undoubtedly have certain responsibilities in assisting in preparations with the program, especially in developing a schedule for a hospital pharmacy section. There will be a great need for hospital pharmacists and others who can speak Spanish, Portuguese, or French, and it is hoped that many will volunteer their services. The Committee on International Hospital Pharmacy Activities should begin as soon as possible to develop plans for the 1957 Congress.

Associate Membership in the F.I.P.

Associate membership in the International Pharmaceutical Federation is open to hospital and other pharmacists interested in international aspects of the profession. At present there are 150 associate members of the F.I.P. in the United States. Of these, it is significant to note that 90 are hospital pharmacists.

The chairman of the Committee on International Hospital Pharmacy Activities handles the dues for all American members of the F.I.P. As a matter of information, annual dues in the F.I.P. are $2.75.

Recommendations

The Committee on International Hospital Pharmacy Activities recommends:

1. That the International Pharmaceutical Federation be requested to give full consideration to the publication of *The Bulletin of the Federation Internationale Pharmaceutique* on a monthly or bimonthly basis.

2. That the International Pharmaceutical Federation be requested to take the initiative in organizing a World Pharmaceutical Federation or Association, in collaboration with the Pan-American Congress of Pharmacy and Biochemistry, and with other pharmaceutical associations of the Asian nations.

3. That the International Pharmaceutical Federation be encouraged to continue to work in close cooperation with the World Health Organization, and also to study possible methods whereby the areas of cooperation may be expanded.

4. That the American Pharmaceutical Association be requested to give serious consideration to sponsoring a World Congress of Pharmacy in the United States in 1957, this meeting to be held in conjunction with the Fourth Pan-American Congress of Pharmacy and Biochemistry.

5. That the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS offer its assistance to the A.Ph.A. in plans for the scheduled Pan-American Congress of Pharmacy and Biochemistry in 1957, or for any international congress which may be decided upon for that year.

6. That hospital pharmacists participating in international meetings with the opportunity to visit hospital pharmacies abroad be requested to prepare a summary of their observations and impressions, and especially to point out new methods, technics, procedures, or policies which may with profit be adopted or modified for use in this country, and that an article be published in THE BULLETIN in order to inform the membership of the SOCIETY of these developments.

7. That the Government of the United States be requested to continue to support the work of the World Health Organization for the prevention, control, and eradication of disease in order to aid the attainment by all peoples of the highest possible level of health.

8. That the U. S. Public Health Service be requested to study methods whereby the programs of the World Health Organization relating to the International Pharmacopoeia, non-proprietary names, and biological standardization may be expedited.

The Committee has prepared a series of suitable resolutions on the above recommendations for the consideration of the SOCIETY'S Committee on Resolutions.

Committee on International Hospital Pharmacy Activities: Don E. Francke, *Chairman*, W. Arthur Purdum, H. D. Roth, Evlyn Gray Scott, Vernon O. Trygstad, Ethel Pierce.

Report of the Committee on Isotopes

CLIFTON LATIOLAIS, *Chairman*

The report of the Committee on Isotopes is published as a separate article in this issue of THE BULLETIN. This was done because the report has considerable reference value and could be adapted to a general article which is more useful than the report alone.

Committee on Isotopes: Clifton Latiolais, *Chairman*, George Hutchinson, Paul Parker, Robert Statler.

Report of the Advisory Committee on Hospital Pharmacy Examination

RICHARD R. SHERWOOD, *Chairman*

The Advisory Committee on Hospital Pharmacy Examination was appointed by your president to meet the need for test material specifically related to the field of Hospital Pharmacy and Hospital Pharmacy Administration. Increasing numbers of hospital pharmacists, growth of membership in the SOCIETY and recognition of the hospital pharmacist as an integral part of the medical care team in hospitals today emphasize the need for comprehensive examinations in this specialized field.

Federal and State agencies, private hospitals and State Boards of Pharmacy have indicated by increasing use of "test item" examination material their desire for this type of examination as a yardstick in evaluating practical and technical abilities. Satisfactory examinations in the general field of pharmacy are available from the Professional Examination Service of The American Public Health Association. We all realize the need for special and additional training in the field of hospital pharmacy, yet today no generally accepted, specific method of evaluating professional qualification in this category is available.

The Committee was assigned the task of compiling "test items" in the field of

hospital pharmacy and hospital pharmacy administration to be submitted to the SOCIETY and then to the Professional Examination Service of The American Public Health Association. This would serve as the nucleus of a list of questions available to all interested agencies—Federal, State, and private—to be used in evaluating the professional qualifications of candidates for positions in hospital pharmacy administration.

It is with a great deal of pleasure that I am able to report that 300 test items have been compiled and submitted as requested. We believe this to be a good start toward at least 1500 comprehensive test items which would seem to be necessary in covering this specialized field.

Much remains to be done, however, with the present list. In order to insure that the material does not fall into the general field of pharmacy and that the questions are fair and representative of that with which the qualified hospital pharmacist should be familiar, a competent, qualified group of experts in the hospital field should review and evaluate the test items. This, of course, will be done by the pharmacy consultants of The American Public Health Association.

Recommendations

It is recommended that this work be continued by appointment of a new committee each year until at least 1500 satisfactory test items have been compiled and are available from the Professional Examination Service of The American Public Health Association as an accepted method for the evaluation of scientific knowledge and the practical application of special techniques and procedures desired in candidates for responsible positions in the field of hospital pharmacy.

It is also recommended that THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS offer to cooperate further with the Professional Examination Service of The American Public Health Association by appointing a special committee to serve until accomplishment of the above recommendation. This Committee would review and evaluate the material submitted, considering the fairness, fitness, and applicability of the questions to the field of hospital pharmacy. Approved material, finally screened for evidence of duplication, would be retained by the Professional Examination Service.

It is further recommended that the Committee on Minimum Standards investigate the possibility of using this material as a tool in evaluating and ultimately setting standards for internship training in hospital pharmacy.

I should like to thank Dr. Archambault for the privilege of working with this Committee and extend a special note of thanks and commendation to the committee members. It was only through their special effort and particular interest in hospital pharmacy that such an excellent start in this project was made.

Advisory Committee on Hospital Pharmacy Examination: Richard Sherwood, *Chairman*, J. Robert Cathcart, Esther I. Clark, Arthur Dodds, Noel Foss, Clifton Lord, Donald Skauen, Robert Statler, Linwood Tice, John Webb, John Zugich.

Report of Advisory Committee on the Proposed National Hospital Formulary Service

DON E. FRANCKE, *Chairman*

At the 1954 Boston Convention of the ASHP a proposal was made that the SOCIETY sponsor a national hospital formulary service and make it available to hospitals at a reasonable cost. This recommendation, together with the proposed organizational structure and functions of the Committee on National Hospital Formulary Service, was published in the Sept.-Oct. (1954) issue of THE BULLETIN of the ASHP.

Following the presentation of the proposal at the Annual Meeting in 1954 the following resolution was adopted by the SOCIETY:

Whereas a hospital formulary service would fill a long-felt need, and

Whereas the Francke Proposal encompasses supplementary services which would be of value to pharmacists and the allied medical profession, and

Whereas the Proposal involves an important undertaking with long-range results, therefore

Be It Resolved that the SOCIETY approve in principle the Proposal for a Hospital Formulary Service, and

Be It Further Resolved that the specially appointed advisory committee give the proposal further study and present its recommendations to the Executive Committee.

President Archambault thereupon appointed an Advisory Committee on a National Hospital Formulary Service. This Committee was composed of twenty-two individuals, of whom thirteen are practicing hospital pharmacists, six are from the pharmaceutical industry, two are administrators of hospitals and also hospital pharmacists, and one is a physician who is an active member of a Pharmacy and Therapeutics Committee.

The Committee assignment was to critically study the proposal, pointing out its advantages and disadvantages, and to make recommendations for its improvement. In addition, Committe members were requested to comment on the following points:

1. Does the proposal, in principle, seem desirable and feasible? Would it fill a need of hospitals and their pharmacists? If associated with a hospital, do you believe your hospital would use the service?

2. Is the proposed organizational plan sound?

3. Do you agree in principle with the titles and functions of the twelve subcommittees which have been recommended? Should any subcommittees be eliminated, their functions changed or modified, or new subcommittees added?

4. Do you have any suggestions as to how the formulary service might be financed?

5. Do you believe that colleges of pharmacy, hospital pharmacy interns, clinicians, hospital administrators, and nurses will cooperate in projects and serve as members of various subcommittees?

6. What in your opinion will be the reaction of the pharmaceutical industry to this proposal? Do you feel that it will in any way be harmful to the major pharmaceutical houses?

7. Enumerate the specific recommendations you have concerning the proposal, and please feel free to make any additional comments you desire to offer.

All members of the Committee received a letter containing the request noted above. Replies were received from fifteen members. It is of interest to note that additional letters were received from fifteen hospital pharmacists located in different sections of the country, most of whom requested information as to when the service would be available. Many of the latter group also presented helpful comments and suggestions on the proposed service.

Replies from Committee members were collated and presented, together with specific recommendations, to the SOCIETY's Executive Committee at its meeting held in Washington on February 26, 1955.

The following is a summary of the principal recommendations and suggestions contained in the letters received from the members of the Committee. In compiling this summary an effort has been made to reflect as fairly as possible the unfavorable as well as the favorable comments.

Desirability and Feasibility

All Committee members responding expressed the opinion that the formulary

service, in principle, is desirable and feasible. One member, however, limited his agreement to that portion of the proposal which deals with the furnishing of monographs for drugs. Another member commented that the service would be feasible only if sufficient copies of monographs were available for wide distribution in each hospital. All hospital pharmacists stated that they would either use the service or would give its use serious consideration.

Organizational Plan

While, in general, most members of the Committee agreed that the overall organizational plan as proposed for the Committee on National Hospital Formulary Service is sound, several offered constructive criticism of certain details of the organizational plan.

The principal objection voiced concerned the inclusion of all voting members of the ASHP House of Delegates as members of the Committee on National Hospital Formulary Service. Opinions were expressed that such a committee would be unwieldy due to its size and, further, that the selection of the delegates by the Affiliated Chapters of the SOCIETY is not based on the individual's interest or ability concerning formulary matters. It was suggested that each Affiliated Chapter of the SOCIETY select a representative to serve on the Committee on National Hospital Formulary Service.

Miscellaneous comments on the proposed organizational plan included statements that: the organization is too elaborate for a beginning; it appears too autocratic; representatives of other organizations such as the American College of Physicians, American College of Surgeons, dental organizations, etc., should be included; the number of subcommittees should be reduced; several subcommittees should be merged initially and the number slowly expanded as required; provision should be made for the Executive Committee of the SOCIETY to name additional members of the Committee on National Hospital Formulary Service; the Committee on National Hospital Formulary Service should be composed only of the members of the various subcommittees. One member seriously questioned the desirability of including physicians, dentists, or nurses on certain of the proposed subcommittees. He also questioned the assignment of responsibility and power of decision to other than pharmacists under any circumstances. Another member stated that the work will be done by individuals and not by committees.

Subcommittee Functions

Numerous suggestions and criticisms were received concerning the functions of the proposed subcommittees. One member of the Committee objected strongly to the proposed Subcommittees on the Evaluation of Drugs, Pharmacy and Therapeutics Committee Activities, and Acceptable Drugs and Nomenclature, and expressed the belief that major controversy would be aroused by inclusion of such subcommittees. It was stated that it would be presumptuous to expect one or more physicians to be either willing or in some cases even clinically competent to evaluate every drug in a particular field. This task, it was emphasized, was done by national and international specialists in laboratory and clinical research prior to the introduction of the drug. This member also stated that each physician evaluates the drugs he uses in his own practice and that he selects the exact type and brand of medication he desires to employ.

Concerning the Pharmacy and Therapeutics Committee, it was stated that this committee had no business interfering in the scheduling of hospital exhibits or relationships between professional service representatives, the pharmacist, and the medical staff. These matters, it was stated, were the responsibility of the administrator of the hospital.

Another member recommended that the Subcommittee on the Evaluation of Drugs establish a panel of representative hospitals to report on the acceptance of drugs and to devise a keying system of notifying subscribing hospitals of acceptance of drugs by various hospitals of the panel. This would provide information as to the general and comparative acceptance of the several products.

It was recommended that activities of the Subcommittee on Acceptable Products and Nomenclature not be limited to an evaluation of those products not passed on by the Council on Pharmacy and Chemistry of the American Medical Association.

Three Committee members recommended that the number of subcommittees be reduced while five members suggested that the number be increased. Recommended additions to the list of subcommittees included: Central Supply; Oto-Rhinolaryngeal Preparations, Diabetic Preparations, Quality Control in Manufacturing and a Contact Subcommittee to provide liaison with the pharmaceutical industry and other segments of pharmacy and other professional groups affected by the formulary service.

The Subcommittee for the Standardization of Hospital Procedures Involving Chemicals and Drugs, it was stated by a Committee member, might tend to standardize to the extent of regimentation. The member believes that it seems logical to have such a subcommittee but that its members should be chosen with special care and that they should limit their activity to preparing a general outline, and allow each hospital to make its own selection.

Question was also raised concerning the legality of using formulas developed by the formulary service because of the danger of infringement upon current patents.

Another Committee member asked whether the SOCIETY planned to initiate a development and research program for new products. This question was raised in response to statements in the proposal that results of studies on products by certain subcommittees "should be released only after a clinical evaluation of the products prepared had been made by clinicians." There was an apparent objection in principle to research and product development by the SOCIETY.

The question was raised as to whether or not some of the suggested functions of the Subcommittee on Parenteral Solutions are in the best interests of the patient. Too few hospital pharmacies carry out the necessary chemical and bacteriologic controls, it was pointed out.

Miscellaneous comments included suggestions that provision be made on the various subcommittees for physicians, nurses, and members of the pharmaceutical industry; for subcommittees to be established by therapeutic classification; that since the U.S.P., the N.F., the N.N.R., and the I.P. cannot agree on nomenclature, the Committee would soon find itself far beyond its depth in the problem; and that nothing will so quickly bring discredit upon the endeavor as premature release of information. It is better to wait a little longer to find out what is good, bad, or indifferent about a new drug.

Financing

Suggestions for financing the formulary service fell into the following categories:

1. Establish a service charge or subscription—seven members suggested this method.

2. By grants from the SOCIETY and BULLETIN—four members suggested this method.

3. By grants from the American Pharmaceutical Association—two members suggested this method.

4. By contributions from hospitals, foundations, industry, individuals—seven

members included this possibility. One member strongly opposed acceptance of contributions from industry.

5. By fees or assessments paid by ASHP members (one member) or by reduced subscriptions fees if paid in advance for three years (one member).

6. Establish a flat annual fee plus special charges for special services not needed by all hospitals.

7. Charge should be for more than formulary monographs alone—it should be sufficient to pay for all adjunct services. Revenue from fees for service is seldom sufficient to match cost of operation and does not cover costs of promotion. Volunteer effort soon dries up.

8. Contact subcommittee could also handle finances.

Cooperation of Colleges, Physicians, etc.

Most (ten) respondents believed that the SOCIETY would receive cooperation from colleges of pharmacy, pharmacy interns, and other pharmacists and members of allied health professions in this project. Three Committee members stressed that the SOCIETY should pay major contributors on a fee-for-service basis. One Committee member expressed the opinion that the allied professional groups would give only lip service.

Reaction of Industry

Seven Committee members expressed the opinion that the pharmaceutical industry would be opposed to the formulary service. Four of these members, however, believed that the major pharmaceutical companies would not be harmed, and several indicated their beliefs that when the service is better understood by industry it will be accepted without opposition. One member stated that the proposal may even now be deemed harmful to the major pharmaceutical companies.

Five members of the Committee stated that industry would not oppose the formulary service (three of the members were from industry). Three of these individuals emphasized, however, that this would be true only if the program were directed by individuals with broad vision and if the program were developed in a fair and equitable manner. One stated that with the right individuals in the key position it could be a great thing for hospital pharmacy.

Additional Comments

1. Use monographs of an existing formulary as a beginning, put them out in loose-leaf style similar to the V.A. Formulary, and let each hospital add new drug products. In this way the formulary service could be begun within a year rather than taking several years for its development.

2. Adopt a title more descriptive than the term formulary—perhaps "Formulary and Contemporary Pharmacy Reference." The term formulary no longer applies to the type of book we are talking about and which is far more than a book of formulas. Title of service should not include the word "National" because it may cause confusion or misunderstanding. A suggested title for the service is the "Hospital Formulary Service of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS."

3. It is essential for the success of the proposal that wide publicity be given to it and that all concerned are informed as to its objectives, functions, etc., in order that misunderstanding be avoided and cooperation be fostered. This publicity program should be carried out through speeches, articles for hospital and pharmaceutical journals, state and national hospital organizations, etc. Hospital pharmacists must all become hospital formulary representatives and by good professional relations in their own hospitals arouse enthusiastic support for the formulary service. Project should be judged objectively. A big educational job needs to be done since not too many hospital pharmacists have any real idea of what the formulary concept embraces.

4. ASHP members might be polled as to their interest in the formulary service.

5. The formulary service should be incorporated and operated on a voluntary, self-sustaining, non-profit principle.

6. Monographs could be published in THE BULLETIN as new drugs are released. These could be considered as part of the advertisements of the pharmaceutical houses but the copy would be approved by the Committee.

7. There should be two types of monographs available—an abbreviated form and a more elaborate one.

8. Pharmaceutical firms probably would be glad to prepare monographs on their specialties for editing by the Committee.

Recommendations

The following recommendations are submitted by the Chairman of the Advisory Committee on a National Hospital Formulary Service after a thorough review and consideration of the extensive comments and suggestions submitted by the members of the Advisory Committee. This is emphasized because all of the individual members of the Committee have not had the opportunity to review the recommendations and there may be some with which the Committee as a whole may disagree.

It is recommended that:

1. The SOCIETY sponsor the formulary service.

2. The service be called the "Hospital Formulary Service of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS."

3. The Executive Committee of the SOCIETY appoint a Director of the Hospital Formulary Service of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

4. The Director of the Hospital Formulary Service of the ASHP be, in addition, Chairman of the Committee on Hospital Formulary Service.

5. The SOCIETY finance the service from its own funds and charge enough for the service to make it self-sustaining with provision for sufficient monies for promotion of the project and remuneration for the Director of the Service and other individuals designated by the ASHP Executive Committee.

6. Because of the importance and possible long-range effects of the formulary service and the need to carefully guide its development through channels acceptable to various segments of pharmacy and other professions, the initial efforts of the Committee on Hospital Formulary Service be directed toward the *service* aspects of the proposal with special emphasis on the preparation and distribution of suitable drug monographs.

7. Continuous study be given to the need, the functions, the areas of responsibility, and the limitations of the several subcommittees named in the proposal. Special and early consideration should be given to the Subcommittees on Evaluation of Drugs, Acceptable Products and Nomenclature, Parenteral Solutions, and Pharmacy and Therapeutics Committee Activities.

8. Provision be made that each Affiliated Chapter of the SOCIETY have one or more representative on the Committee on Hospital Formulary Service of the ASHP—these individuals to be selected in a manner to be determined by the Executive Committee of the SOCIETY.

9. In order to reduce the number of subcommittee chairmen in the initial stages of operation, one individual be requested to serve as chairman of two subcommittees. This would automatically reduce the size of the Executive Committee of the Hospital Formulary Service without the elimination of any subcommittees.

10. Provision be made for the Executive Committee of the SOCIETY to name additional members to the Executive Committee of the Hospital Formulary Service.

11. A publicity and educational program on the Hospital Formulary Service of the ASHP be formulated and effected, and that all members of the SOCIETY be requested to cooperate in this project.

12. A Contact Subcommittee be established to provide liaison with the pharmaceutical industry and other groups within the profession which may be affected by the formulary service.

13. The ASHP Executive Committee give full consideration to the recommendation made by an Advisory Committee member that monographs of an existing formulary be used initially as the basis for the SOCIETY's formulary service.

In concluding this report, your chairman would like to express his deep and sincere appreciation to the members of this Advisory Committee for the serious and thoughtful consideration they gave to their assignments. Their comments were based upon a deep interest in the problem at hand, their suggestions and recommendations were most helpful and reflected a careful study of the proposal. To each member of the Advisory Committee I give my personal thanks for their splendid service given in the interests of their profession.

Advisory Committee on National Hospital Formulary Service: Don E. Francke, *Chairman*, Robert Bogash, Grover C. Bowles, Herbert L. Flack, Walter M. Frazier, John Gooch, Hans S. Hansen, C. K. Himmelsbach, J. Warren Lansdowne, William LeBar, John MacCartney, John McDonnell, John Murphy, W. Arthur Purdum, Anna C. Richards, Parke Richards, Jr., Sister M. Jeanette, Sister M. Marian, Sister Mary Berenice, Anna Thiel Shannon, C. J. Vance, D. Zimmerman.

Report of the Committee on Economic Poisons

HENRY BEARD, *Chairman*

In order that the number of cases of accidental poisoning be reduced and that information on the proper treatment for the ingestion of any of the many new and unknown (mostly synthetic) chemical products flooding the market today be available, the function of this Committee should be to collect information concerning the pharmacology, toxicology and methods of treatment for their ingestion and to distribute this information among the members of the SOCIETY who will then be able to present it to their medical staff as a professional service.

The public, as well as the medical and allied professions, is well aware of the progress that has been made in materia medica in the past fifteen years. With the increase in pharmacological knowledge and the practicability of manufacturing highly potent drugs for specific physiological effect, it can be stated that many, if not most, drugs commonly used today may be potentially harmful when incorrectly used. The hospital pharmacist of today is capable of giving professional advice and caution on the use of the new drugs used in the practice of medicine; at least he has at hand sources of information concerning them. Accompanying the advent of the new medicaments there has been, and is, a tremendous amount of productive research in chemistry and physics resulting in the daily appearance on the market of new household detergents, cleaners, polishes, pesticides, rodenticides, preparations used in home hobbies and so on. True they were not made for human consumption, but, nevertheless, a percentage will be taken by children, adults and pets, and there is little, if any, information concerning their pharmacology, toxicity (or lack of it), or treatment. Another problem that must be solved is the duplication of names and changing of formulas. It is possible and quite common for a product to be marketed under a variety of names and also for a named product to have its formula changed frequently. It is necessary that up-to-date information concerning the ingredients in the formulas of these preparations and cross-indexing of the names be provided.

This Committee is not alone in its interest in solving the problems of toxicity of the new synthetic chemicals. The American Medical Association, The American Public Health Association, various Federal, State and City agencies concerned with public health, boards of pharmacy, schools of pharmacy and others are actively engaged in the solution of this problem. It is believed that there is definitely a place for the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS in the program of collecting and distributing information concerning household and economic poisons, their toxicity, treatment for their ingestion, and the proper care and storage in the home.

Medicines in themselves cause a great number of poisonings. Statistics in the years 1949 and 1950 showed that aspirin (and other salicylates) was the cause of 33 percent of the deaths in the United States by poisoning in children under five years of age. A study of a nine month period last year in Washington, D. C. shows that 60 percent of the poisoning in children under four years of age was due to the accessibility and improper use of medication.

Recommendations

It is recommended that hospital pharmacists:

1. Use strip labels freely "Keep out of the reach of children."

2. Advocate the use of locked medicine cabinets in the home. It is further urged that poisons, paints, solvents, detergents and other potentially toxic preparations be stored in a locked cabinet.

3. Instruct patients (with the physician's permission) to destroy medications as soon as the need for them in the current illness is past; it may be possible to place stickers with this suggestion on the packaged medication.

4. Place date limitations on drugs that deteriorate rapidly, such as antibiotics.

5. Varnished labels be used as they remain legible for a longer period and under more adverse circumstances than those untreated.

It is further recommended that:

1. The SOCIETY determine whether the Committee on Household and Economic Poisons be continued.

2. That plans be made for each hospital pharmacy to have a cross-indexed card file listing the household and economic poisons with the required information as to formula, potentially toxic ingredients, a note on the pharmacology and toxicology and the essentials of treatment. It will be necessary for the SOCIETY to make arrangements to have the cards published; continuous revision would be required.

3. Other methods for the distribution of information could be used:

A. If permission can be obtained, publish the four basic manuals that are expected to be released in the coming year in THE BULLETIN OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

B. Or have the SOCIETY arrange to print the material and keep it in a loose leaf binder.

C. Or make arrangements to have the members of the SOCIETY purchase their own manuals.

Committee on Economic Poisons: Henry W. Beard, *Chairman*, Bernard Conley, Betty Job, Alphonse Seubert, Tadiashi T. Tomihiro.

2 DIVISION OF HOSPITAL PHARMACY

of The American Pharmaceutical Association and *The American Society of Hospital Pharmacists*

Report of the Division of Hospital Pharmacy

DON E. FRANCKE, *Director*

Since this has been a short Association year, (August 1954-April 1955) I shall attempt to give you only a summary of the activities of the Division of Hospital Pharmacy of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS. The limitations in time also prevent our presenting a more complete report. For the record, details of the Division activities are published in THE BULLETIN from time to time. We do want the members of the SOCIETY, as well as the Association, to be cognizant of the work being carried out by the Division.

What is being accomplished from year to year in hospital pharmacy is not to be easily calculated. But so long as we see progress, we know that the machinery which has been set in motion is not only workable, but produces results. Probably no other professional group in pharmacy has made such great strides in recent years. We are aware that this progress is due not only to the work being carried out by the Division, but to the continuing efforts of your SOCIETY, the affiliated chapters, and individual hospital pharmacists.

Last year you heard a report on the major activities being carried out by the Division. Since your last Annual Meeting, we have held one meeting of the Policy Committee. Of major concern at that meeting was the need for proceeding with a program for evaluating hospital pharmacy internships. A beginning is underway and Dr. Fischelis is reporting to you later today on the total plan. Further details of this activity, including the suggested plan of procedure, will also be published in THE BULLETIN in due time.

Closely allied with the evaluation of internships are the scholarships and fellowships being offered in hospital pharmacy. It is generally agreed that no statement regarding scholarships for hospital pharmacy internships should be made until an evaluation program has been established. It is, of course, intended that we should discourage setting up scholarships in institutions where approved internships are not in operation.

Institutes and Other Continuing Educational Programs

This year two institutes are being planned in order that more hospital pharmacists over a larger geographical area can take advantage of these programs. As most of you know, these institutes are scheduled for Chicago in June and Atlanta in August.

It is anticipated that the possibility of holding two institutes will be again considered in 1956. As the result of specific requests from ASHP Chapters in Austin, Texas and Seattle, Washington, the Policy Committee is recommending to the American Hospital Association that Seattle or Austin and Philadelphia be considered as possible sites for the 1956 institutes.

Attention is also being given to the many local and state meetings of this type which are contributing immeasurably to better hospital pharmacy practice. We want to encourage continuation and expansion of these programs in order that more hospital pharmacists can take advantage of some form of continuing education. We refer specifically to such programs as the Texas Seminar, the California Workshop and the Ohio Institute for Administrators and Pharmacists.

Routine and Special Activities

The expanding routine activities in the Division office in Washington continue to be carried out by Miss Gloria Niemeyer and Mrs. Virginia Dean along with assistance from other staff members in the Association. Dr. Robert P. Fischelis has continued to serve as Chairman of the Policy Committee and has general supervision over the office activities. Dr. Don Francke, as Director of the Division, has given assistance on major projects.

A summary of the routine activities being carried out in the Division office is as follows:

I. Information Services to Hospital Pharmacists
II. Activities of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS
  A. Membership
  B. ASHP Secretarial Duties
  C. BULLETIN Work
  D. Contacts with Affiliated Chapters, (through A.Ph.A. and ASHP)
III. Membership Activities (A.Ph.A. and ASHP)
  A. Routine
  B. Contacts with Prospective Members
IV. Public and Professional Relations
  A. Exhibits
  B. Promotion of National Hospital Week and National Pharmacy Week among Hospital Pharmacists
  C. Editorial Comment in publications (Journal and THE BULLETIN)
  D. Attendance at Meetings
V. Institutes
VI. Policy Committee Activities
VII. Miscellaneous Activities

Each of these activities could be elaborated on at length. However, we do not feel this is necessary at this time. Should members of the SOCIETY have questions or suggestions regarding the services being offered through the Division Office, we would be glad to hear from you.

It should be mentioned that each of these activities is being gradually expanded in line with trends in hospital pharmacy practice and the demands of the membership. With the limited staff available, every effort is being made to provide services which will meet the needs of practicing hospital pharmacists.

Miscellaneous

In view of the growth of the affiliated chapters of the SOCIETY and their important role in the development of hospital pharmacy, we are giving more attention to providing services which will aid the various groups in carrying out their programs. During the past year, the secretaries of the ASHP affiliates have been placed on the mailing list to receive special bulletins sent from the Association Headquarters from time to time. In addition to this, through the Division, we were able to send recorded messages to each of the chapters during the past year. This included messages from your president and secretary as well as from the A.Ph.A. secretary.

3 CONSTITUTION AND BY-LAWS

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AMERICAN SOCIETY OF HOSPITAL PHARMACISTS

affiliated with the

American Pharmaceutical Association

Constitution

AS REVISED 1954

Article I. Name, Objectives, and Definitions

Section 1. This SOCIETY shall be known as "The American Society of Hospital Pharmacists."

Section 2. The objectives of the SOCIETY shall be: (a) to provide the benefits and protection of a hospital pharmacist to the patient, to the institution which he serves, to the members of the allied health professions with whom he is associated, and to the profession of pharmacy, which they will receive through the skill and art of qualified hospital pharmacists; (b) to improve the qualifications and usefulness of hospital pharmacists through high standards of professional ethics, education, and attainments; (c) to assist in providing for a future adequate supply of such qualified hospital pharmacists; (d) to promote research in hospital pharmacy practices and in pharmaceutical problems in general; (e) to increase the dissemination of pharmaceutical knowledge by providing for interchange of information.

Section 3. A hospital pharmacist shall be defined as any legally qualified pharmacist currently practicing the art and science of pharmacy in a hospital or clinic, or actively engaged in the administration, planning, or supervision of pharmaceutical procedures in hospitals or clinics.

Article II. Membership

The membership of the SOCIETY shall consist of active, associate, and honorary members as provided in Chapter V of the By-Laws.

Article III. Officers

The officers of the SOCIETY shall be a President, a Vice-President, a Secretary, and a Treasurer. The President and Vice-President shall be elected annually for a term of one year as provided in the By-Laws. The President and Vice-President shall hold office for not more than two consecutive terms. The Secretary and Treasurer shall be elected every three years as provided in the By-Laws.

Article IV. Affiliated Chapters

A local or regional group of hospital pharmacists numbering ten or more active members of the SOCIETY and meeting the requirements for affiliation as outlined in Chapter IX, *Article 1* of the By-Laws, may become an affiliated chapter of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS upon approval of the Executive Committee of the SOCIETY.

Article V. Amendments

Every proposition to alter or amend this Constitution shall be submitted in writing by two active members at the first session of the Annual Meeting of the SOCIETY, and shall be approved by a plurality of the active membership in attendance at this session. It shall then be submitted to the entire active membership for vote by mail ballot, in the same manner as in the balloting for officers, Chapter I, *Articles 2* and *3* of the By-Laws, and shall be sent out as a part of the ballot for officers. Should an amendment to the Constitution not be approved by a plurality vote at the Annual Meeting, it may then be referred to the active membership by mail ballot, on the request of ten active members.

By-Laws

Chapter I. Election of Officers

Article 1. NOMINATION OF PRESIDENT, VICE-PRESIDENT, AND TREASURER. At the first session of each Annual Meeting of the SOCIETY, the President shall appoint a Committee of three members who shall nominate two candidates for each of the following offices: President and Vice-President. Every third year* the Committee, on the recommendation of the Executive Committee, shall also nominate two or more candidates for the office of Treasurer. The Committee shall present its nominations at the final session of the Annual Meeting, at which time additional nominations may be made from the floor.

Article 2. BALLOTS. The names of the candidates together with a brief review of their professional backgrounds shall be submitted by the Secretary by mail to every active member of the SOCIETY within two months after their nomination. The member shall indicate on the ballot his choice of candidates for the offices to be filled and return the same by mail within 30 days of the date printed on the ballot.

Article 3. COUNTING OF BALLOTS. The ballots of the dues-paid members only, postmarked within 30 days of the date printed on the ballot, are to be submitted by the Secretary to the Board of Canvassers, who shall count the votes. The Board of Canvassers shall certify to the President and the Secretary the results of the election. The Secretary shall notify all candidates of the results of the election, and the results of the election shall also be published in THE BULLETIN of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

Article 4. INSTALLATION OF OFFICERS. The officers thus elected by a plurality of votes, together with the Secretary elected as hereinafter provided, shall be installed at the final session of the Annual Meeting of the SOCIETY following their election.

Article 5. ELECTION OF SECRETARY. The Secretary of the SOCIETY shall be nominated by the Executive Committee and elected every third year** by the House of Delegates of the SOCIETY.

Chapter II. Duties of Officers

Article 1. PRESIDENT AND VICE-PRESIDENT. The President, or in his absence, the Vice-President, shall preside at all meetings. He shall have the usual administrative powers of his office, except as otherwise provided. He shall appoint all committees not otherwise provided for and shall be ex-officio member of all committees. He shall appoint the Board of Canvassers which shall consist of at least three active members of the SOCIETY. He shall, with approval of the Executive Committee, direct the activities and determine the policies of the SOCIETY. He shall cooperate with the activities of the Division of Hospital Pharmacy of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS, working closely with the Director of the Division. He shall attempt to meet with each of the several affiliated chapters of the SOCIETY following his installation. He shall preside over the House of Delegates.

Article 2. SECRETARY. The Secretary shall keep minutes of the sessions of the SOCIETY and maintain a roster of its members. He shall notify individuals of their appointment to committees, notify members of the time and place of all meetings, and conduct the correspondence of the SOCIETY. He shall collect the dues of the members. The Secretary shall prepare and mail to all eligible voting members appropriate ballot forms for the annual voting of the SOCIETY. He shall be an ex-officio member of all standing committees. He shall assist where possible, with the secretarial activities of all standing and special committees. He shall keep the President informed of all activities by forwarding to him copies of pertinent correspondence. He shall present a written report of his work to the Annual Meeting of the SOCIETY. The Secretary shall be Secretary of the House of Delegates.

Article 3. TREASURER. The Treasurer and Secretary shall establish a bank account in the name of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS to receive, disburse, and account for all monies received from membership dues. The Treasurer, or in his incapacity, the Secretary, shall disburse them at the direction of the Finance Committee. The Treasurer shall have the account audited and shall prepare a statement of finances for the Annual Meeting.

Chapter III. Executive Committee

The Executive Committee shall consist of the officers of the SOCIETY, the chairman of each standing committee, the President-Elect, and the Past-President of the SOCIETY. It shall meet on the call of the President of the SOCIETY, and shall be empowered to act for the SOCIETY during the period between annual meetings.

Chapter IV. Accomplishment of Objectives

The objectives of the SOCIETY as outlined in Article I, *Section 2* of the Constitution shall be accomplished by: (a) establishing, implementing, and revising the Minimum Standard for Pharmacies in Hospitals; (b) working with the medical profession, in extending the rational use of medicaments; (c) acting as a clearing house for problems and challenges confronting hospital pharmacy; (d) maintaining proper liaison between pharmacists in hospitals, those engaged in general pharmaceutical practice, and those associated with the allied health professions; (e) developing and making available to the accredited colleges of pharmacy a course outline to serve as a guide for an undergraduate course in hospital pharmacy; (f) providing a standardized hospital training for graduates of accredited colleges of pharmacy through establishing, implementing, and revising the Minimum Standard for Pharmacy Internships in Hospitals; (g) actively cooperating with the Division of Hospital Pharmacy of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

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*The Treasurer nominated at the 1955 Annual Meeting and elected by mail ballot will take office for a three year term beginning with the 1956 Annual Meeting. Thereafter, elections for Secretary and Treasurer will take place in 1958, 1961, etc.

**In accordance with the resolution passed at the 1954 Annual Meeting, the Secretary elected in 1955 will begin a term immediately. Although elections for Secretary and Treasurer will be held in the same years, the Treasurer's term will begin a year later due to the fact that he will be elected by mail ballot rather than at the Annual Meeting.

Chapter V. Membership

Article 1. MEMBERS. The membership of the Society shall consist of individuals interested in the objectives of the Society.

(a) ACTIVE MEMBERS. Active members shall be hospital pharmacists as defined in Article I, *Section 3* of the Constitution, who are members of the American Pharmaceutical Association.

(b) HONORARY MEMBERS. Honorary members may be elected from among individuals who are or have been especially interested in, or who have made outstanding contributions to hospital pharmacy practice. Honorary members shall not pay dues nor shall they be eligible to vote or to hold office.

(c) ASSOCIATE MEMBERS. Associate members may be elected from among individuals other than hospital pharmacists who by their work in the health services, the teaching of prospective hospital pharmacists, or otherwise contributing to hospital pharmacy, make themselves eligible for membership. Associate members shall not be entitled to hold office or to vote. Associate members must be members of the American Pharmaceutical Association.

Article 2. DUES. Dues for active and associate members shall be five dollars ($5.00) per year, payable in advance.

Article 3. APPLICATIONS.

(a) ACTIVE MEMBERS. Applications for active membership shall be prepared on the standard form and forwarded to the Secretary of the Society. Dues should accompany the application as indicated in Chapter V, *Article 2* of the By-Laws. Applicants shall be sponsored by at least one active member of the Society. The Secretary may approve all applications for membership, or when there is doubt as to qualifications of the applicant, he may require concurrence by the Membership and Organization Committee. When an active member so changes his vocation as to no longer fit the definition of a hospital pharmacist, he shall automatically become an associate member with the rights and privileges of associate membership.

(b) HONORARY MEMBERS. Nominations for honorary membership shall be approved by unanimous vote of the Executive Committee and shall be presented for vote of the membership at an Annual Meeting.

(c) ASSOCIATE MEMBERS. In addition to the requirements for active membership as indicated in Chapter V, *Article 3* of the By-Laws, applicants for associate membership shall be sponsored by at least two active members of the Society.

Article 4. PERIOD OF MEMBERSHIP. The period of membership shall coincide with the period of membership in the American Pharmaceutical Association. Dues are payable and due on the anniversary date of this period. Membership in the Society and the obligation for dues will continue from year to year unless a member's resignation, signed by the member, is received by the Secretary prior to the end of the year for which dues have been paid.

Any member in arrears for dues for one year shall cease to be a member of the Society, provided that at least two weeks before his name is removed from the rolls, the Secretary shall send him a written notice of his delinquency together with a copy of the By-Laws pertaining to the subject. Such a person may be reinstated as a member provided his arrears have been paid and payment of current membership dues is made.

Article 5. CERTIFICATE. All members will receive from the Secretary an appropriate certificate attesting to membership in the Society.

Chapter VI. Standing Committees

There shall be five standing committees of the Society, each consisting of three or more members appointed by the President of the Society with concurrence of the Past-President and other officers of the Society.

Article 1. PROGRAM AND PUBLIC RELATIONS COMMITTEE. The Program and Public Relations Committee shall assume responsibility for the program at the Annual Meeting of the Society; shall assist in the sponsoring of the programs for local, state, and national conventions of medical, dental, hospital, and pharmaceutical associations, working in conjunction with the program committees of the respective local and regional hospital pharmacy associations; and shall maintain a reservoir of suitable material representative of hospital pharmacy for display at these various conventions. Where possible it shall assist in the formulation of the program for the annual Institute on Hospital Pharmacy. It shall assist the Secretary of the Society in collecting and making available for publication, information on the activities of hospital pharmacists. It shall seek the cooperation of the Division of Hospital Pharmacy in these activities.

Article 2. MEMBERSHIP AND ORGANIZATION COMMITTEE. The Membership and Organization Committee shall seek desirable members. It shall develop such plans as may be found desirable to establish state, district, and local affiliated groups of hospital pharmacists. It shall seek the cooperation of the Division of Hospital Pharmacy in these activities.

Article 3. MINIMUM STANDARDS COMMITTEE. The Minimum Standards Committee shall propose the Minimum Standard for Pharmacies in Hospitals and the Minimum Standard for Pharmacy Internships in Hospitals. It shall also develop a syllabus for specialized hospital pharmacy courses. It shall obtain opinions on hospital pharmacy educational practices from those persons offering such training, and present an annual review of such practices as differ from the standards and that offer features desirable for other courses to incorporate. It shall review both the standards and the syllabus yearly in light of modern principles of hospital pharmacy practice and make necessary recommendations for revision. It shall seek the cooperation of the Division of Hospital Pharmacy in these activities.

Article 4. FINANCE COMMITTEE (ASHP). The Finance Committee shall consist of three members: the President, the Secretary, and the Treasurer, who may, without further action, pass on all expenditures. The Finance Committee shall prepare a budget for the succeeding year and submit it to the Executive Committee for approval.

Article 5. COMMITTEE ON PHARMACISTS IN GOVERNMENT SERVICE. The Committee on Pharmacists in Government Service shall assemble current information pertaining to problems affecting pharmacists in government service. Periodic review shall be made by the Committee of duties performed by hospital pharmacists in government service for the purpose of recommending methods conducive to the improvement of hospital pharmacy service. The findings and recommendations of the Committee shall be transmitted to the Director of the Division of Hospital Pharmacy, who shall be responsible for obtaining evaluation of the findings and recommendations for the purpose of resolving and implementing them, either through the national Committee on the Status of Pharmacists in Government Service, or other indicated organizations.

Chapter VII. Special Committees

The President may appoint such special committees as he feels are required for the activities of his term of office, each consisting of three or more members appointed by him with concurrence of the Past-President and other officers of the SOCIETY.

Chapter VIII. House of Delegates

Article 1. MEMBERSHIP. The House of Delegates shall consist of the Executive Committee of the SOCIETY, the chairman of each special committee of the SOCIETY, voting delegates, and fraternal delegates. Unless otherwise specified, meetings shall be open to all hospital pharmacists. The power of vote is restricted to the Executive Committee, special committee chairmen, and voting delegates.

(a) VOTING DELEGATE. Each affiliated chapter of the SOCIETY shall be entitled to designate such delegates as its membership warrants and in a manner to be determined by each chapter. Each affiliated chapter with 50 or fewer active members is entitled to one delegate. Each affiliated chapter with more than 50 active members is entitled to one delegate for each additional 50 active members.

(b) FRATERNAL DELEGATE. Any branch or department of the United States Government such as the Army, Navy, Air Force, Public Health Service, and Veterans Administration shall be entitled to designate one delegate. Such fraternal delegates may be granted the privilege of the floor but shall not be entitled to vote. The Secretary of the SOCIETY shall annually initiate an invitation to the ranking medical officer of each of the governmental health services to appoint said delegate.

Article 2. SELECTION OF DELEGATES. Delegates shall be designated by each affiliated chapter and confirmed by the Secretary of the SOCIETY. Organizations entitled to membership must notify the Secretary of the names of delegates and alternates prior to each Annual Meeting so that credentials may be prepared.

Article 3. MEETINGS. The House of Delegates shall meet at a time designated by the President of the SOCIETY, on the day preceding the first day of the Annual Meeting of the SOCIETY. At the discretion of the President, additional sessions of the House of Delegates may be called during the period of the Annual Meeting.

Article 4. OFFICERS. The officers of the House of Delegates shall be the officers of the SOCIETY.

Article 5. PURPOSE. The House of Delegates shall assist the Executive Committee in the formulation of policy. Where possible, all items of new business, proposed amendments to the Constitution and By-Laws, and all controversial matters should be presented first to the House of Delegates and then to the first session of the Annual Meeting. It shall elect the Secretary of the SOCIETY. Each organization entitled to representation shall provide its delegate with a concise report of the activities and recommendations of the organizations, which shall be presented at the call for reports. This report will also be presented in writing to the Secretary at the meeting. This will provide an opportunity for each affiliated chapter, through its delegate, to present comments and recommendations on local and national matters pertaining to hospital pharmacy practice. If it is impossible for an organization to send a delegate to this meeting, said organization shall submit its written report to the Secretary prior to the meeting.

Article 6. ORDER OF BUSINESS. At stated or adjourned meetings, business shall proceed in the following order:

1. Call to order.
2. Roll call of delegates.
3. Reading and adoption of minutes.
4. Appointment of committees.
5. Receipt of reports and other communications to the House of Delegates.
6. Unfinished business.
7. New business.
8. Adjournment.

Chapter IX. Affiliated Chapters

Article 1. REQUIREMENTS FOR AFFILIATION.

(a) All members of every affiliated chapter shall be members of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS. There must be a minimum of ten active members before a group may apply for affiliation with the national organization.

(b) The chapter shall submit a list of officers and membership, minutes of the meeting at which the request for affiliation was approved, and a statement of frequency of meetings. Subsequent changes in officers and in times of meetings should be forwarded to the Secretary of the SOCIETY.

(c) The Constitution and By-Laws shall be approved by the Executive Committee of the SOCIETY and should be patterned after the Constitution and By-Laws of the SOCIETY. Any subsequent change in the Constitution and By-Laws must be approved by the Executive Committee of the SOCIETY.

(d) The formal application for affiliation should be initiated by the President and Secretary of the chapter and directed to the Secretary of the SOCIETY who will submit such application to the Executive Committee of the SOCIETY for approval.

Article 2. MEMBERSHIP. Membership in affiliated chapters shall be restricted to active, associate, and honorary members as defined in Chapter V, *Article 1* of the By-Laws. Persons not so classified may attend meetings of the Chapter at the invitation of the Executive Committee of the chapter.

Article 3. DUES. Dues in affiliated chapters may be set at the discretion of the Executive Committee of the chapter.

Article 4. REPORTS. A copy of the minutes of every meeting of affiliated chapters should be sent to

the Secretary of the Society immediately following each meeting, and not later than ten days following the meeting date. Additions to and changes in the membership of the chapter should be included therein.

Article 5. REPRESENTATIVES TO THE HOUSE OF DELEGATES. Each affiliated chapter is entitled to representation in the House of Delegates as outlined in Chapter VIII, *Article 1,* (a) of the By-Laws of the Society.

Chapter X. Publications

Article 1. OFFICIAL PUBLICATION. The Bulletin of the American Society of Hospital Pharmacists shall be the official publication of the Society. All papers presented at the Annual Meeting of the Society shall be submitted to the Editor of The Bulletin for review and, if suitable, for publication. Papers may be released for publication elsewhere on the approval of the editor of The Bulletin.

Article 2. EDITOR. The editor of The Bulletin shall be appointed by the Executive Committee of the Society.

Article 3. FINANCES. (The Bulletin).

(a) The Secretary of the Society shall establish a bank account in the name of The Bulletin of the American Society of Hospital Pharmacists. All monies received from advertising in, sale of, and subscriptions to The Bulletin and all bills relative to publishing The Bulletin shall be handled through this account. The Editor of The Bulletin and the Secretary of the Society shall receive, disburse, and account for all monies in this account. This account shall be audited annually.

(b) The Executive Committee of the Society shall be empowered to transfer such excess funds as may accrue in this account to either the American Society of Hospital Pharmacists or to the Division of Hospital Pharmacy.

(c) A contribution of one dollar per member will be made annually from the Society funds toward publication of The Bulletin. The amount for each year shall be determined by the total membership as reported at the Annual Meeting.

Chapter XI. Annual Meetings

Annual meetings of the Society shall be held in conjunction with annual meetings of the American Pharmaceutical Association.

Chapter XII. Quorum

Fifteen members shall constitute a quorum for an Annual Meeting.

Chapter XIII. Order of Business

At stated or adjourned meetings business shall proceed in the following order:

1. Call to order.
2. Roll call of delegates.
3. Reading and adoption of minutes.
4. Appointment of committees.
5. Ratification of special committees.
6. Receipt of reports and other communications to the Society.
7. Unfinished business.
8. New Business.
9. Report of Resolutions Committee.
10. Report of Nominating Committee.
11. Installation of officers.
12. Adjournment.

Chapter XIV. Affiliation

The Society shall be affiliated with the American Pharmaceutical Association and subject to such rules and regulations as may be mutually agreed upon to govern the Society.

Chapter XV. Seal and Insignia

Article 1. SEAL. The Society shall have a seal which shall consist of the device of a circle with the word "Seal" in the center surrounded by the words "American Society of Hospital Pharmacists" arranged within the perimeter.

Article 2. INSIGNIA. The insignia of the Society shall consist of the device of a mortar and pestle, the lip of the mortar being at about 250° and the handle of the pestle at about 315°, with the words "American Society of Hospital Pharmacists" inscribed through this in a semicircle, meeting the pestle on the left at juncture of mortar and pestle, the whole of this centered in a white cross on a green background.

Chapter XVI. Amendments

Every proposition to alter or amend these By-Laws shall be submitted in writing by two active members at the first session of the Annual Meeting of the Society and voted upon at the final session of the same Annual Meeting. A plurality of votes is required for approval.

4 AFFILIATED CHAPTERS AND OFFICERS

Regional Chapters

SOUTHEASTERN SOCIETY OF HOSPITAL PHARMACISTS

President, Terry Nichols, V.A. Hospital, Birmingham, Ala.; *Vice-President*, Charles Barnett, St. Luke's Hospital, Jacksonville, Fla.; *Secretary*, William Taylor, North Carolina Memorial Hospital, Chapel Hill, N.C.

WESTERN PENNSYLVANIA SOCIETY OF HOSPITAL PHARMACISTS

President, Joseph Oddis, Western Pennsylvania Hospital, Pittsburgh 19, Pa.; *Vice-President*, Sister M. Francine, St. Francis Hospital, Pittsburgh, Pa.; *Secretary*, Ann Keane, Mercy Hospital, Stevenson & Locusts Sts., Pittsburgh, Pa.; *Treasurer*, Mrs. Dorothy Kelly, Presbyterian Hospital, Pittsburgh, Pa.

State and Local Chapters

Alabama

SOCIETY OF ALABAMA HOSPITAL PHARMACISTS

President, Perry Cox, Carraway Methodist Hospital, Birmingham, Ala.; *Vice-President*, Meredith Ward, V.A. Hospital, Tuscaloosa, Ala.; *Secretary-Treasurer*, Lillie Mazzara, Highland Baptist Hospital, Birmingham, Ala.

Arizona

ARIZONA SOCIETY OF HOSPITAL PHARMACISTS

President, A. L. Picchioni, University of Arizona, School of Pharmacy, Tucson, Ariz.; *Vice-President*, June Kimberlin, Memorial Hospital, Phoenix, Ariz.; *Secretary*, Gene Knapp, 1108 E. Meadowbrook, Phoenix, Ariz.; *Treasurer*, Beatrice Tomlinson, Pinal County Hospital, Florence, Ariz.

California

NORTHERN CALIFORNIA SOCIETY OF HOSPITAL PHARMACISTS

President, Alphonse A. Seubert, University of California Hospital, Pharmacy Department, San Francisco, Calif.; *Vice-President*, Stanley Marincek, University of California Hospital, San Francisco, Calif.; *Secretary*, Mrs. Marie B. Kuck, St. Luke's Hospital, 27th & Valencia, San Francisco, Calif.; *Treasurer*, Eric Owyang, 2050 - 22nd Ave., San Francisco, Calif.

SOUTHERN CALIFORNIA SOCIETY OF HOSPITAL PHARMACISTS

President, Joe Ball, 539 N. Hobart Blvd., Los Angeles, Calif.; *Vice-President*, Mrs. Alice Calnon, 501 Linda Vista, Pasadena 2, Calif.; *Secretary*, William Harms, 4122 S. Bronson Ave., Los Angeles 8, Calif.; *Corresponding Secretary*, Mrs. Norma Irish, 914 S. Abbot Ave., San Gabriel, Calif.; *Treasurer*, Mrs. Luba Perlmutter, 415 N. Orange Grove, Los Angeles, Calif.

Connecticut

CONNECTICUT SOCIETY OF HOSPITAL PHARMACISTS

President, John Webb, Hartford Hospital, Hartford, Conn.; *Vice-President*, Rose Cartenuto, Griffin Hospital, Derby, Conn.; *Secretary*, Ruth Pully, Chief Pharmacist, Charlotte Hungerford Hospital, Torrington, Conn.; *Treasurer*, Sister Maria Lucia, Hospital of Saint Raphael, New Haven, Conn.

Florida

FLORIDA SOCIETY OF HOSPITAL PHARMACISTS

President, Anna D. Thiel, Jackson Memorial Hospital, Miami 36, Fla.; *Vice-President*, Lewis Bevis, Tallahassee Memorial Hospital, Tallahassee, Fla.; *Secretary-Treasurer*, Margaret Tribbett, 1115 Oak Drive, Leesburg, Fla.

SOUTHEASTERN FLORIDA SOCIETY OF HOSPITAL PHARMACISTS

President, Mary Wernersbach, 2395 N.E. Sixth Ave., Miami, Fla.; *Vice-President*, Carl Dell, Jackson Memorial Hospital, Miami, Fla.; *Secretary-Treasurer*, Ralph T. DeYoung, Victoria Hospital, Miami Beach, Fla.

Georgia

GEORGIA SOCIETY OF HOSPITAL PHARMACISTS

President, Jack Kirkland, P.O. Box 415, Tifton, Ga.; *Vice-President*, C. E. Peacock, 306 E. Church St., Sandersville, Ga.; *Secretary*, James Brewer, 1965 Handley Ave., S. W., Atlanta, Ga.; *Treasurer*, Douglas Johnson, 416 - 7th St., N.E., Atlanta, Ga.

Illinois

THE ILLINOIS CHAPTER OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS

President, Dwight Deardorff, Univ. of Ill. College of Pharm., 808 S. Wood St. Chicago, Ill.; *Vice-President*, Paul Parker, University of Chicago Clinics, Chicago, Ill.; *Secretary-Treasurer*, Nelson Kitsuse, Louis A. Weiss Mem. Hosp., Chicago, Ill.

MIDWEST ASSOCIATION OF SISTER PHARMACISTS (CHICAGO)

President, Sister M. Hortensis, P.H.J.C., St. Elizabeth Hospital, Chicago, Ill.; *Vice-President*, Sister M. Cherubim, O.S.F., St. Joseph Hospital, Joliet, Ill.; *Treasurer*, Sister M. Evarista, O.S.F., St. Anthony Hospital, Chicago, Ill.; *Secretary*, Sister Mary Tarcissa, S.S.M., St. Francis Hospital, Blue Island, Ill.; *Editor of Adjuvant*, Sister M. Kateri, R.S.M., St. Joseph Mercy Hospital, Aurora, Ill.

Indiana

INDIANA SOCIETY OF HOSPITAL PHARMACISTS

President, Glen Sperandio, Purdue University School of Pharmacy, West Lafayette, Ind.; *Vice-President*, Charles Schreiber, 441 - 10th St., Tell City, Ind.; *Secretary-Treasurer*, Eileen Foley, 604 N. Main St., South Bend, Ind.

Iowa

IOWA SOCIETY OF HOSPITAL PHARMACISTS

President, William Tester, General Hospital, State University of Iowa, Iowa City, Iowa; *Vice-President*, Charles P. Roe, 505 River St., Iowa City, Iowa; *Secretary*, Norma Jochumsen, 276 Kenilworth Rd., Waterloo, Iowa; *Treasurer*, Sister Mary Catherine, Mercy Hospital, Iowa City, Iowa.

Kansas

SOCIETY OF HOSPITAL PHARMACISTS OF GREATER KANSAS CITY*

President, J. C. Chipman, St. Mary's Hospital, Kansas City, Mo.; *Vice-President*, Roy O. Boyle, University of Kansas Medical Center, Kansas City, Kans.; *Secretary*, Mary Lee Griffith, Menorah Medical Center, Kansas City, Mo.; *Treasurer*, Ethel Branard, Research Hospital, Kansas City, Mo.

Louisiana

LOUISIANA SOCIETY OF HOSPITAL PHARMACISTS

President, Frances Pizzolato, Touro Infirmary, New Orleans, La.; *Vice-President*, John F. Kellerman, Hotel Dieu Sisters' Hospital, New Orleans, La.; *Secretary*, Lelia De Valle, (no address); *Treasurer*, Gladys Hebert, 3129 Mauepas, New Orleans, La.

Maryland

MARYLAND ASSOCIATION OF HOSPITAL PHARMACISTS

President, Robert L. Capehart, P.H.S. Med. Supply Depot, Perry Point, Md.; *Vice-President*, Eugene George Czapiewski, Union Memorial Hospital, Baltimore, Md.; *Secretary-Treasurer*, Mary Ann Coleman, 1401 Eutaw Pl., Baltimore, Md.; *Corresponding Secretary*, Dudley A. Demarest, 908 Lynhurst St., Baltimore 29, Md.

Massachusetts

MASSACHUSETTS SOCIETY OF HOSPITAL PHARMACISTS

President, Edward N. Deeb, Veterans Hospital, Rutland Heights, Mass.; *Vice-President*, Charles F. Schraub, New England Deaconess Hospital, Boston, Mass.; *Secretary*, Ida Guber, Faulkner Hospital, 1153 Centre Street, Jamaica Plain, Mass.; *Treasurer*, Yolande Caron, 16 Dow Street, Salem, Mass.

Michigan

MICHIGAN SOCIETY OF HOSPITAL PHARMACISTS

President, Harold Taylor, Woman's Hospital, Detroit, Mich.; *Vice-President*, Virginia

*Affiliation Applied For

Cross, Children's Hospital, Detroit, Mich.; *Corresponding Secretary*, Patricia Pauling, Children's Hospital, Detroit, Mich.; *Recording Secretary*, Helen Rutkowsi, Sinai Hospital, Detroit, Mich.; *Treasurer*, George Phillips, University Hospital, Ann Arbor, Mich.

Minnesota

MINNESOTA SOCIETY OF HOSPITAL PHARMACISTS

President, Louise Hunkins, Minneapolis General Hospital, Minneapolis, Minn.; *Vice-President*, Ruth Lofstrom, Northwestern Hospital, Minneapolis, Minn.; *Secretary-Treasurer*, Hallie Bruce, University Hospitals, Minneapolis, Minn.

Mississippi

MISSISSIPPI SOCIETY OF HOSPITAL PHARMACISTS

President, James T. Brookshier, V.A. Hospital, Jackson, Miss.; *Vice-President*, William W. Woods, Rush Memorial Hospital, Meridian, Miss.; *Secretary*, Doris W. Cassidy, 1425 South St., Vicksburg, Miss.; *Treasurer*, Joseph Campbell, Anderson Infirmary, Meridian, Miss.

Missouri

HOSPITAL PHARMACISTS ASSOCIATION OF GREATER ST. LOUIS

President, Quentin Dickmann, R.R. 2, Godfrey, Ill.; *Vice-President*, Francis Fillingim, 605 Clara Ave., Apt. 608, St. Louis 12, Mo.; *Treasurer*, Sister Mary David, 1100 Bellevue Ave., St. Louis 17, Mo.; *Secretary*, Margaret McBride, P.O. Box 66, Marionville, Mo.

Nebraska

NEBRASKA SOCIETY OF HOSPITAL PHARMACISTS

President, Daniel Moravec, Lincoln General Hospital, Lincoln, Nebr.; *Vice-President*, Albert Lunt, V. A. Hospital, Omaha, Nebr.; *Secretary*, Gwen Merlin, Nebraska Methodist Hosiptal, Omaha, Nebr.; *Treasurer*, Sister Ruth Morris, Immanuel Hospital, Omaha, Nebr.;

New Jersey

NEW JERSEY SOCIETY OF HOSPITAL PHARMACISTS

President, Anna C. Richards, Mountainside, Hospital, Montclair, N. J.; *Vice-President*, Eugene Von Stanley, Mercer Hospital, Trenton, N. J.; *Treasurer*, Henry Roche, St. Michaels Hospital, Newark, N.J.; *Secretary*, Sister Marian Flynn, St. Elizabeth Hospital, Elizabeth, N. J.

New York

GREATER NEW YORK CHAPTER OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS

President, Sister Etheldreda, St. Mary's Hospital, Brooklyn, N.Y.; *Vice-President*, Sister Maria Joseph, St. Joseph's Hospital, Far Rockaway, N.Y.; *Recording Secretary*, Sister Virginia, Mercy Hospital, Long Island, N.Y.; *Corresponding Secretary*, Sister Jeanette, Mary Immaculate Hospital, Jamaica, Long Island, N.Y.; *Treasurer*, Sister Angeline, St. Mary's Hospital, Brooklyn, N.Y.

NORTHEASTERN NEW YORK SOCIETY OF HOSPITAL PHARMACISTS

President, Benjamin Teplitsky, V.A. Hospital, Albany, N.Y.; *Vice-President*, Lucy Manvel, Leonard Hospital, Troy, N.Y.; *Secretary*, Virginia M. Manory, St. Peters Hospital, Albany, N.Y.; *Treasurer*, Caryl Heeder, Columbia Memorial Hospital, Hudson, N. Y.

SOCIETY OF HOSPITAL PHARMACISTS OF THE ROCHESTER AREA

President, Denise Eno, Strong Memorial Hospital, Rochester, N.Y.; *Vice-President*, Paul Miller, Strong Memorial Hospital, Rochester, N. Y.; *Secretary*, William Whitcomb, Rochester General Hospital, Rochester, N. Y.; *Treasurer*, Clifton J. Latiolais, Strong Memorial Hospital, Rochester, N. Y.

WESTERN NEW YORK CHAPTER OF THE AMERICAN SOCIETY OF HOSPITAL PHARMACISTS

President, Herbert Rieman, Mercy Hospital, Buffalo, N.Y.; *Vice-President*, Rose Marie Lee, Deaconess Hospital, Buffalo; *Secretary*, Kathleen DeClare, Memorial Hospital, Niagara Falls, N. Y.; *Treasurer*, John Hintz, V.A. Hospital, Buffalo, N. Y.; *Director*, Clifton Lord, University of Buffalo, Buffalo, N. Y.

North Carolina

NORTH CAROLINA SOCIETY OF HOSPITAL PHARMACISTS

President, Rudolph Hardy, Gaston Memorial Hospital, Gastonia, N. C.; *Vice-President*, (Vacant); *Secretary*, William W. Taylor, North Carolina Memorial Hospital, Chapel Hill, N.C.; *Treasurer*, Edward Superstine, Duke Hospital, Durham, N.C.

Ohio

AKRON AREA SOCIETY OF HOSPITAL PHARMACISTS

President, Jean Sickafoose, Aultman Hospital, Canton, Ohio; *Vice-President*, Charles Lovelady, St. Thomas Hospital, Akron, Ohio; *Secretary*, Jack Hovis, Salem City Hospital, Salem, Ohio; *Treasurer*, Jack Smittle, Ohio Valley Hospital, Steubenville, Ohio.

CLEVELAND SOCIETY OF HOSPITAL PHARMACISTS

President, William Martineau, Huron Road Hospital, Cleveland, Ohio; *Vice-President*, Thomas Sisk, St. Joseph's Hospital, Lorain, Ohio; *Secretary*, Cynthia Wu, St. Luke's Hospital, Cleveland, Ohio; *Treasurer*, Freda Escavage, 1045 Argonne Road, South Euclid, Ohio.

GREATER CINCINNATI SOCIETY OF HOSPITAL PHARMACISTS

President, Paul J. Schneeberger, 4539 Innes Ave., Cincinnati, Ohio; *Vice-President*, Charles Ehlers, 2512 Ravine, Cincinnati, Ohio; *Secretary*, Mrs. Clara Stine, 2225 Stratford Ave., Cincinnati 19, Ohio; *Treasurer*, Elizabeth Lynch, 3775 Drakewood Dr., Cincinnati 9, Ohio.

OHIO SOCIETY OF HOSPITAL PHARMACISTS

President, Henry F. Szymczyk, Cleveland Clinic Foundation, Cleveland, Ohio; *President-Elect*, Robert A. Crocetti, Children's Hospital, Columbus, Ohio; *Secretary*, Sister Margaret Mary, H.H.M., St. Joseph's Riverside Hospital, Warren, Ohio; *Treasurer*, Sister Jeanne Marie, H.H.M., St. Elizabeth's Hospital, Youngstown, Ohio.

TOLEDO SOCIETY OF HOSPITAL PHARMACISTS

President, Eric Theller, Fremont Memorial Hospital, Toledo 11, Ohio; *Vice-President*, Theodorsia Tucker, Mercy Hospital, Toledo, Ohio; *Secretary-Treasurer*, Alice Banachowski, Riverside Hospital, Toledo, Ohio.

Oklahoma

OKLAHOMA SOCIETY OF HOSPITAL PHARMACISTS

President, Marguerite Jones, Hillcrest Memorial Hospital, Tulsa, Okla.; *Vice-President*, Stokes Baggett, V.A. Hospital, Oklahoma City, Okla.; *Secretary-Treasurer*, Sister M. Teresa, St. Anthony Hospital, Oklahoma City, Okla.

Oregon

SOCIETY OF HOSPITAL PHARMACISTS OF THE STATE OF OREGON

President, Fred Turville, 2843 N. E. 21st. St., Portland, Ore;. *Vice-President*, Byron Smith (no address); *Secretary*, Mary Hubbard, 808 E. 25th St., Vancouver, Wash.; *Treasurer*, Dick Daggett (no address).

Pennsylvania

PHILADELPHIA HOSPITAL PHARMACISTS ASSOCIATION

President, Basil Ketcham, V.A. Hospital, Philadelphia, Pa.; *Vice-President*, Thomas A. Manzelli, Lankenau Hospital, Philadelphia, Pa.; *Recording Secretary*, Fannie Wasserman, Kensington Hospital, Philadelphia, Pa.; *Corresponding Secretary*, Herbert L. Flack, Jefferson Medical College Hospital, Philadelphia, Pa.; *Treasurer*, Robert Simons, 104 Buck Lane, Collins Park, New Castle, Del.

Rhode Island

RHODE ISLAND SOCIETY OF HOSPITAL PHARMACISTS

President, Robert J. Daigle, Rhode Island State Sanatorium, Wallum Lake, R.I.; *Vice-President*, John McCormack, 34 Sunset Ave., North Providence, R.I.; *Corresponding Secretary*, Edward Gilberti, State Institutions, Howard, R.I.; *Recording Secretary*, Iolanda Santopadre, 150 Home Ave., Providence 8, R.I.; *Treasurer*, Harold Udell, 1559 Smith St., North Providence, R.I.

Tennessee

TENNESSEE SOCIETY OF HOSPITAL PHARMACISTS

President, Ralph Stone, Vanderbilt University Hospital, Nashville, Tenn.; *Vice-President*, Joseph Sykes, John Gaston Hospital, Memphis, Tenn.; *Secretary*, R. M. Simmons, Nashville General Hospital, Nashville, Tenn.; *Treasurer*, Adele Stigler, Eye, Ear, Nose & Throat Hospital, Memphis, Tenn.

Texas

HOUSTON AREA SOCIETY OF HOSPITAL PHARMACISTS

President, A. W. Pfluger, 4005 Welford Drive, Bellaire, Texas; *Vice-President*, James A. Glass, 7322 Staffordshire, Houston, Texas; *Secretary-Treasurer*, Dorothea L. Siler, 509 Shakespeare Road, Houston 25, Texas.

TEXAS SOCIETY OF HOSPITAL PHARMACISTS

President, Charles Henry, Baylor Hospital, Dallas, Tex.; *Vice-President*, Jack McDaniel, Providence Hospital, Waco, Tex.; *Secretary-Treasurer*, Jean Sheffield, University of Texas Student Health Center, Austin, Tex.

Utah

UTAH SOCIETY OF HOSPITAL PHARMACISTS

President, Nellie Vanderlinden, St. Mark's Hospital, Salt Lake City, Utah; *Vice-Presi-*

dent, Thomas E. Marshall, Veterans Hospital, Salt Lake City, Utah; *Secretary,* Wallace Thorup, L.D.S. Hospital, Salt Lake City, Utah; *Treasurer,* Sister M. Rebecca Schmidt, St. Benedict's Hospital, Ogden, Utah.

Washington

WASHINGTON STATE HOSPITAL PHARMACISTS

President, Theodore Taniguchi, King County Hospital, Seattle, Wash.; *Vice-President,* Ruth Brown, Group Health Hospital, Seattle, Wash.; *Secretary,* Pauline Greenberg, Children's Orthopedic Hospital, Seattle, Wash.; *Treasurer,* James Button, Virginia Mason Hospital, Seattle, Wash.

Wisconsin

WISCONSIN SOCIETY OF HOSPITAL PHARMACISTS

President, Dell A. Olszewski, 4614 W. Fillmore Drive, Milwaukee 15, Wisc.; *Vice-President,* Edward Froncek, 2201 W. Oklahoma Ave., Milwaukee 15, Wisc.; *Secretary-Treasurer,* Ursula E. Heyer, 1220 Dewey Ave., Wauwatosa 13, Wisc.

Virginia

VIRGINIA SOCIETY OF HOSPITAL PHARMACISTS*

President, David Anderson, King's Daughters Hospital, Staunton, Va.; *Vice-President,* Russell H. Fiske, Medical College of Virginia, Richmond, Va.; *Secretary-Treasurer,* Mary Ann Magee, Medical College of Virginia, Richmond, Va.

*Affiliation Applied For

5 ADDRESS OF THE PRESIDENT-ELECT

Address of the President-Elect

CLAUDE BUSICK

Reverend Sisters, President Archambault, Ladies and Gentlemen of the House of Delegates:

As your president-elect I am grateful to you for the honor you have bestowed upon me. I realize fully the responsibilities of this office and I will not knowingly fail to carry out your wishes. I ask your prayers and cooperation to help me discharge the duties I now assume.

To follow in the footsteps of my illustrious predecessors is no small task. This Society, through the patience and inspired guidance of these men and the help of everyone, has grown in prestige throughout the country. Any man who actively attends the Society's meetings cannot be a failure.

I want to thank you for electing Milton Skolaut, vice-president, Sister Mary Rebecca, treasurer, and Miss Gloria Niemeyer, secretary. It is an honor to be associated with them and I know their assistance will be most helpful to me.

There have been tremendous changes in the practice of hospital pharmacy in the past few years and we are bound to see more during the coming years. Interest in hospital pharmacy should be stimulated. You, the members, can do a tremendous selling job and I hope you will. I have set a goal of 600 new members for this year. Go out and talk a friend into joining the Society.

Two of the projects for the coming year will be to propose:

1. A training or guidance course for the pharmacist who works part time in small hospitals.

2. Tangible benefits for the members in the form of group insurance.

There are over 1,500 hospitals that have 50 beds or less. These small hospitals admitted more than two and one-half million patients last year. A 50 bed hospital purchases drugs in an excess of $12,000.00 annually. Many of these small hospitals have no pharmacist or at best a neighborhood pharmacist drops in for an hour or two a day to cover the legal aspects of the hospital pharmacy. These men or women are doing a community service. Their contribution could be made easier for them and eventually a benefit to the Society if they had a manual to help them set up their community hospital pharmacy.

I am fully aware of the resolution passed in Salt Lake City in 1953. I feel it lacks depth and scope for this particular problem. The part time pharmacist's need is for an immediate brief, definite guidance which could be supplied with a procedure manual or package course.

It is true that we have the Minimum Standard and education program. I would like to say that it is one of the most vital and necessary programs in hospital pharmacy; however, it does not fill the need for the problem at hand.

Pharmacy has become increasingly scientific which is as it should be but in so doing we should not overlook the patient and his needs. One of the tenets of hospital pharmacy is better patient care at lower cost. This is where we as a Society can help the pharmacists in small hospitals who are graduates in pharmacy but have had no hospital pharmacy training. I became aware of this about six years ago when I was asked to orient a part time hospital pharmacist. In the interval since then each time I have helped a "budding" hospital pharmacist I realize that the need is for a basic, not scientific, guide.

The other project I would like to bring to your attention is group insurance for the Society. I would like to ask an Advisory Committee to study and report to the Executive Committee the possibility of group insurance to cover hospitalization, accident and sickness indemnity at a low cost compared with individual policy premiums. Age limits and acceptable risks without examinations and insurance for dependents are other favorable factors in group insurance.

I am now appointing the chairmen of the committees for the ensuing year: (See page 442 of Proceedings for list of Committee appointments.)

Too often the work of leaders in organizations is accepted without thought of the time, energy and endless detail needed for smooth functioning. Now more than ever I appreciate Dr. Robert P. Fischelis and Dr. Don E. Francke who have given willingly and generously of their talents for the betterment of hospital pharmacy.

As for Gloria Niemeyer, words fail me to express my appreciation for her help to me and to the Society. Without her enthusiasm and "know-how" the road of the president-elect would indeed be rough.

The strength of this Society has been realized because the members have been dedicated to a single cause—that of raising the standards of hospital pharmacy and patient care. This solidification must continue. Your whole hearted support of the program for the coming year is essential.

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Atlantic City, N. J.

NATIONAL PHARMACY WEEK
Oct. 2-8, 1955

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Oct. 1-2, 1955
Birmingham, Ala.

MARYLAND-DISTRICT OF COLUMBIA-DELAWARE HOSPITAL ASSOCIATION
November 7-9, 1955
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AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE
December, 1955
Atlanta, Ga.

NEW ENGLAND HOSPITAL ASSEMBLY
March 26-28, 1956
Boston, Mass.

SOUTHEASTERN HOSPITAL CONFERENCE
April 18-20, 1956
Miami Beach, Fla.

AMERICAN PHARMACEUTICAL ASSOCIATION
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April 30-May 3, 1956
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COMPATIBILITIES AND INCOMPATIBILITIES OF SOME PARENTERAL MEDICATION

by ROBERT C. BOGASH

THE IMPORTANT AND OFTEN DIFFICULT APPRAISAL of whether several parenteral drugs are compatible upon admixture frequently can be of critical therapeutic value and can avoid further discomfort to the patient. This paper presents a preliminary study of specific small volume parenterals that are commonly added, singularly or in combination, to large volume sterile solutions. This preliminary study in no way pretends to be conclusive. It attempts to offer an initial study for future expansion and projection. A further expanded compilation, we feel, will be of invaluable use to hospital pharmacists, physicians, nurses and manufacturers.

Previous to twenty-five years ago, there was a minimum of interest and inquiry into the chemical nature of body fluids. Since then, however, methods to measure body compartment volume and composition have been developed and many new physical as well as analytical procedures have been developed. Each succeeding year has seen a rapid accumulation of facts pertaining to parenteral therapy.

Today, the routine use of parenteral solutions of one or more components has assumed its position in the physician's time honored armamentarium. The physician not only relies on parenteral products, but demands further refinements of these solutions as more knowledge is made available regarding compartment volume, metabolism, electrolyte and nutritional balance. This can be attested to by the constant requests for extemporaneous sterile solutions to be prepared by the hospital pharmacist.

As this knowledge is made available and utilized, we have seen further acceptance of parenteral therapy and a directly proportional increase in the use of these solutions.

Formerly, such simple solutions as isotonic sodium chloride and dextrose 5 percent were prescribed almost exclusively. This is not the case today. A new trend has definitely been established. A substantially large number of parenteral solutions are formulated directly from the last laboratory determination regarding the individual patient being treated. Certainly this type of therapy is to the advantage of the patient being treated and the physician who has available the most recent, accurate information on the chemical and nutritional status of his patient. However, while this type of prescribing is mutually advantageous to patient and physician, it does often present specific disadvantages to the hospital pharmacist and the nurse.

Complicated Formulation

The same knowledge and understanding that has increased the over-all prescription habits for solutions has similarly complicated the formulation, dispensing and administration of these solutions. Not only have the individual ingredients of these solutions become more complex, but in many instances, the necessary buffering, stabilizing and preservative chemicals added, further compound and complicate the final preparation. All of which presents no problem when these preparations are used singularly for their therapeutic effect. However, parenteral therapy being what it is today, it is not the unusual prescription to have one, two or more injectable medications added to a flask containing a large volume of sterile solution for intravenous administration or for hypodermoclysis. At this point the pharmacist, with or without his knowledge, is often interjected into the picture.

The chemico-physical compatibility or incompatibility of this type prescription is rarely given

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Presented at the Institute on Hospital Pharmacy, Storrs, Conn., June 28, 1954.

TABLE OF COMPATIBILITY AND INCOMPATIBILITY OF CERTAIN DRUGS INJECTED INTRAVENOUSLY

ADRENAL CORTEX EXTRACT	compatible with Thiamine Hydrochloride, Vitamin B Complex, Potassium Chloride, Desoxycorticosterone Acetate
ADRENALIN HYDROCHLORIDE	incompatible with Wyamine Sulfate
ACHROMYCIN HYDROCHLORIDE	compatible with Parenamine, Travamin 5%, Travamin 10% Alcohol 7.7%, Levugen with Vitamins, Levugen with Saline and Vitamins Folbesyn, Manibee
AMINOPHYLLINE	compatible with Digoxin, Digitoxin, intravenously in Dextrose 5% in Water, Dextrose 5% in Saline and Dextrose 10% in Water
BEROCCA-C	incompatible with Aminophylline compatible with Parenamine, Gantrisin Diethanolamine,[2] Penicillin G Potassium,[2] Aureomycin Hydrochloride,[2] Terramycin Hydrochloride,[2] Achromycin Hydrochloride[2] compatible with intramuscular Liver Extract Crude, Liver Extract Refined
CHLOR-TRIMETON MALEATE	compatible with Penicillin G Potassium, Corticotropin, Cortisone Acetate, Blood, Dextran 6%, Hyaluronidase
CORTONE ACETATE	used intravenously for special purposes, not recommended by manufacturer
FOLBESYN	compatible with Achromycin Hydrochloride, Vitamin C, Potassium Chloride, Hyaluronidase products
GANTRISIN DIETHANOLAMINE	compatible with Hyaluronidase products, Aminophylline, Terramycin Hydrochloride,[2] Berocca C,[2] Penicillin G. Potassium[2]
HYALURONIDASE PRODUCTS	incompatible with oxidizing agents such as: Adrenalin Hydrochloride and anionic moieties such as Heparin
ILOTYCIN GLUCOHEPTONATE	compatible with Vitamin B-12, Vitamin B Complex, Vitamin C compatible for intramuscular use with Liver Extract Refined, Reticulogen
LEVOPHED BITARTRATE	compatible with Dextran 6%. Should not be administered in blood or plasma[3] (*1)
LYO B-C, FORTE	compatible with Vitamin C, Vitamin B-12, Vitamin K, Potassium Chloride, Hyaluronidase products
NEO-SYNEPHRINE HYDROCHLORIDE	compatible with Dextran 6% (*1)
POTASSIUM CHLORIDE	compatible with Vitamin B Complex, Vitamin C, Vitamin K, Vitamin B-12, Protein Hydrolysates
PRONESTYL HYDROCHLORIDE	contraindicated in Sulfonamide Therapy (*2)
RUBRAMIN	incompatible with Vitamin K Diphosphate (*3), Vitamin C. (*2), Dextrose (*2)
SOLU B SOLU B 5X SOLU B WITH C SOLYZYME	compatible with Hyaluronidase products, Vitamin K, Calcium Gluconate, Potassium Chloride, Vitamin B-12
SYNKAYVITE SODIUM DIPHOSPHATE	compatible with Vitamin C, Mercuhydrin, Prostigmin Methylsulfate, Terramycin Hydrochloride, Atropine Sulfate
WYAMINE SULFATE	colors in the presence of oxidants

a second thought by the busy clinician. He is absorbed in diagnosing his patient's complaint and then selecting those therapeutic agents that he feels are indicated in the treatment of the disease or syndrome that he has diagnosed. In general, the physician's knowledge of the compatibility of prescribed preparations is minimal. In reality, it is not his responsibility. It is, therefore, the responsibility of the hospital pharmacist to be as fully aware of these phenomena as possible. Not only is it our responsibility to seek out this information for our personal and professional knowledge, but in so many instances the problem is thrust upon us by the familiar question posed by a nurse, "Can I add X solution to Y solution?" This type of question is indicative of the confidence placed in the pharmacist regarding the compatibility of all medications, regardless of the route of administration.

This confidence then, was stimulus in spurring our interest somewhat further than merely attempting to solve particular problems as they arose. On this premise we proceeded to correlate and compile what limited data we possessed and project it forward. This projection was limited by several factors—primarily by the theorem of combination and permutation; secondarily by the protective rights of patent legislation. The sheer number of possible combinations of all parenteral products would be relatively difficult to discern with our limited research facilities. This fact in mind, we limited our study to those combinations of par-

INJECTABLE PRODUCT	QUANTITY PER LITER	DEXTROSE 5% WATER	DEXTROSE 5% SALINE	LEVUGEN 10% H_2O	LEVUGEN 10% SALINE	LEVUGEN 10% ELECTROLYTES	AMIGEN 5% LEVUGEN 10%	AMIGEN 5% DEXTROSE 5%	SODIUM R-LACTATE 1/6 M	RINGERS LACTATE	PROCAINE .1% SALINE	POLYSAL
ADRENALIN	1 mg.	.	.	.	.	.	.	.	.	.	.	.
ADRENAL CORTEX EXTRACT	50 cc.	.	.	.	.	.	.	.	4	4	4	.
ACTHAR	25 Units	.	.	.	.	.	.	.	.	.	4	.
ALIDASE	150 TR Units	.	.	.	.	.	.	.	.	.	4	.
ACHROMYCIN	500 mg.	.	.	.	.	.	.	.	.	.	.	.
AUREOMYCIN	500 mg.	.	.	.	no	1	no	.	.	no	.	no
BACITRACIN SYSTEMIC	600 Units	.	.	4	4	4	4	4	4	4	4	4
BEROCCA - C	2 cc.	.	.	.	.	.	.	.	.	.	.	.
CORTONE	(*4)	.	.	.	.	4	4	4	4	4	4	4
FOLBESYN	1 Vial	.	.	.	.	.	.	.	.	.	.	.
GANTRISIN 10 cc.	1 Vial	.	.	.	.	4	4	4	4	4	4	4
HEPARIN SODIUM	300 mg.	.	.	.	.	.	.	.	4	4	4	4
HYKINONE	72 mg.	.	.	.	.	.	.	.	.	.	.	.
ILOTYCIN	250 mg.	.	.	.	.	.	4	4	4	4	4	4
LEVOPHED	(*1)	.	.	.	.	.	4	4	4	4	4	4
LYO B-C FORTE	1 Vial	.	.	.	.	.	.	.	.	4	4	.
NEO-SYNEPHRINE	(*1)	.	.	.	.	4	4	4	4	4	4	4
NOVOCAINE	1 Gm.	.	.	.	.	.	.	.	.	.	4	4
POTASSIUM CHLORIDE	3 Gm.	.	.	.	.	.	.	.	.	.	.	.
PENTOTHAL SODIUM	1 Gm.	.	.	no	4	4	4	no	4	4	4	4
PENICILLIN G POTASSIUM	10^6 Units	.	.	.	.	.	.	.	.	.	.	.
PRONESTYL	(*2)											
PROTAMINE ZINC INSULIN	800 Units	.	.	.	no	.	no	.	4	4	4	4
ILETIN	800 Units	.	.	.	.	.	.	.	.	4	4	4
RUBRAMIN	(*2)	no	no	no	no	no	no	no	.	.	.	.
SOLU-B	1 Vial	.	.	.	.	.	.	.	.	.	.	.
SOLU-B 5x	1 Vial	.	.	.	.	.	.	.	.	.	.	.
SOLU-B with C	1 Vial	.	.	.	.	.	.	.	.	.	.	.
SOLUZYME	1 Vial	.	.	.	.	.	.	.	.	.	4	.
SYNKAVITE	10 mg.	.	.	.	.	.	.	.	.	.	4	.
SULFADIAZINE SODIUM	2.5 mg.	.	.	no	no	no	no	no	4	4	4	no
TERRAMYCIN	250 mg.	.	.	.	.	.	.	.	4	4	4	.
WYAMINE	(*3)	.	.	.	.	.	.	.	.	.	.	.
CHLOR-TRIMETON	10 mg.	.	.	.	.	.	.	.	.	.	.	.
AMINOPHYLLIN	250 mg.	.	.	.	.	.	.	.	4	4	4	.
NEMBUTAL SODIUM	2.5 Gm.	.	.	.	.	.	no	4	4	4	4	4
WYDASE	150 TR.	.	.	.	.	.	.	.	.	.	.	.

KEY TO SYMBOLS

(.) - compatible
no - incompatible
1 - crystals appear in about 12 hrs.
2 - should be diluted first to 1000 cc.
3 - oxidize in 12-24 hrs.
4 - determinations not done
5 - crystals appear after 1 hr.
6 - crystals appear after 2 hrs.
(*) - correspondence with m'f'r.

Dromoran Hydrochloride and Levo-Dromoran Bitartrate	compatible with Scopolamine Hydrobromide, Atropine Sulfate, Prostigmin Methylsulfate
Nisentil Hydrochloride	compatible with Scopolamine Hydrobromide, Prostigmin Methylsulfate
Procaine Penicillin Aqueous	compatible with Streptomycin Sulfate, Dihydrostreptomycin Sulfate, Streptoduocin (combinations of Streptomycin-dihydrostreptomycin Sulfates), Chlor-Trimeton Maleate Injectable, Benadryl Hydrochloride Injectable
Prostigmin Methylsulfate	compatible with Berocca C, Manibee, Manibee C, Thiamine Hydrochloride, Vitamin C, Demerol Hydrochloride, Dromoran Hydrochloride, *Levo*-Dromoran Bitartrate, Pantopon Hydrochloride, Nisentil Hydrochloride, Synkayvite Sodium Diphosphate, Menadione Sodium Bisulfite, Atropine Sulfate
Thorazine Hydrochloride	compatible with Demerol Hydrochloride, Dilaudid Hydrochloride, Morphine Sulfate, Codeine Sulfate, Scopolamine Hydrobromide

enteral solutions most frequently prescribed in this Hospital. The protective rights of patent legislation limited our study, due to a readily understandable hesitancy on the part of certain manufacturers to disclose buffering, stabilizing and other chemical ingredients. Therefore, our study relies more on the physical means rather than the chemical means of determining compatibility and incompatibility of added injectables to various sterile solutions.

Method of Study

The means of determination were as follows: After admixture of specific parenteral products to commonly used solutions designed for intravenous injection, the solution was inspected immediately. A second inspection was made four hours after admixture. If no particulate matter appeared on unaided visual examination after admixture, or after several hours, the injectable products were rated "compatible." If particulate was observed visually, either immediately after admixture or after several hours, they were rated "incompatible." The products regarded compatible on the above described basis are designated with a dot (.) in the following tabulation—those regarded "incompatible" are designated (no). Any deviation of a singular compatible or incompatible basis is designated by a numeral.

In this determination, note that the criterion used for compatibility has been the presence of readily visible amounts of particulate matter. We have not examined these products from the standpoint of chemical incompatibility which might be indicated by some such phenomenon as "gas evolution." This study, therefore, cannot be used to say categorically, that there will be no hazard whatever involved in the admixture of these products to the solutions listed, even though on the basis of the absence of obvious particles they appear to be "compatible."

It should further be noted that throughout this study where commercial products have been listed by name, they have been chosen solely on the basis of frequency of use, that frequency being determined by survey at Lenox Hill Hospital, New York City.

Considering the many potential combinations and permutations that could possibly result, the tabulation presented below is arranged on a singular addition basis. Frequent combinations of two or more parenteral solutions added to large volume solutions are submitted following the tabulation. This list is based on the frequency with which certain injectables are added to a primary therapeutic agent. An example being the common combination of Vitamin B Complex Injection with the administration of Adrenal Cortex Extract.

Acknowledgements

I would like to express my appreciation and extend my sincere gratitude to the following firms for their cooperation in affording us information regarding their products. It is this type of professional service that propagates their goodwill and stability in the profession.

Armour Laboratories
Baxter Laboratories, Inc.
Commercial Solvents Corp.
Cutter Laboratories
Endo Products, Inc.
Eli Lilly & Co.
Hoffmann-La Roche, Inc.
Lederle Laboratories
Mead Johnson & Co.
Merck & Co., Inc.
Chas. Pfizer & Co.
Squibb & Sons
Upjohn & Co.
Winthrop Stearns, Inc.
Wyeth & Co.

References

*1. Personal Correspondence—Desmond Slevin, M.D., Winthrop Stearns, Inc.

*2. Personal Correspondence—M. N. Donin, Ph.D., Squibb Institute of Medical Research

*3. Personal Correspondence—Richard Bogash, Ph.D., Wyeth Institute of Applied Biochemistry

*4. Personal Correspondence—C. E. Brindley, M.D., Merck & Co.

SAMPLE OUTLINE FOR A

COURSE IN MATERIA MEDICA AND PHARMACOLOGY

which may be presented to

STUDENT NURSES

by The Hospital Pharmacist

Submitted as part of 1954 Report of ASHP Committee on Minimum Standards

1

Introduction

Lecture 1

1. Scope and Objectives of Course
2. Definitions
   - A. Materia Medica
   - B. Pharmacology
   - C. Therapeutics
   - D. Toxicology
   - E. Posology
   - F. Pharmacy
3. Standards
   - A. United States Pharmacopeia (U.S.P.)
   - B. National Formulary (N.F.)
   - C. New and Nonofficial Remedies (N.N.R.)
   - D. American Dental Remedies (A.D.R.)
4. References
   - A. United States Dispensatory
   - B. Remington's Practice of Pharmacy
   - C. Pharmacological Basis of Therapeutics (Goodman and Gilman)
   - D. Pharmacologic Principles of Medical Practice (Krantz and Carr)
   - E. Modern Drug Encyclopedia (Gutman)
5. Sources of Drugs
   - A. Chemical
   - B. Plant
   - C. Animal
6. Pharmaceutical Preparations
   - A. Solutions
   - B. Tinctures
   - C. Fluidextracts
   - D. Spirits
   - E. Waters
   - F. Syrups
   - G. Mucilages
   - H. Elixirs
   - I. Emulsions
   - J. Glycerites
   - K. Infusions and Decoctions
   - L. Wines
   - M. Liniments and Lotions
   - N. Mixtures and Suspensions
   - O. Powders
   - P. Pills
   - Q. Tablets—CT, CCT, HT, EC.
   - R. Capsules
   - S. Suppositories
   - T. Ointments and Cerates
   - U. Nasal drops, sprays, aerosols
   - V. Plasters
   - W. Chartulae

Lecture 2

1. Action of Drugs
   - A. Site and nature of action
     - 1. Local
       - (a) Irritant
       - (b) Demulcent
       - (c) Salt action
     - 2. Systemic
     - 3. Chemical
     - 4. Physical
     - 5. Substitution Therapy
     - 6. Stimulation
     - 7. Depression

Members of the 1954 Committee on Minimum Standards of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS were: Walter Frazier, *Chairman;* Alice Appel, Grover C. Bowles, W. Arthur Purdum; and John J. Zugich.

2. Properties of Chemicals
   A. Solutions
      1. Solubility
      2. Saturation
      3. Concentration
      4. Isotonicity
      5. Ionization
      6. pH
      7. Buffers

3. Classification of Effects of Drugs (Nomenclature)
   A. Selective
   B. Specific
   C. Antagonistic
   D. Additive
   E. Synergism
   F. Potentiation
   G. Side effects
   H. Cumulation
   I. Tolerance
   J. Addiction

4. Therapeutic Classifications
   A. Drugs acting on skin and mucous membrane
      1. Demulcents
      2. Emollients
      3. Protectives
      4. Irritants
      5. Escharotics
      6. Astringents
      7. Antiseptics
      8. Reconstructives (vulneraries)
      9. Disinfectants
      10. Parasiticides
      11. Fungicides
      12. Deodorants
      13. Depilatories
      14. Detergents

   B. Drugs acting on alimentary canal
      1. Sialogogues
      2. Stomachics
      3. Acidizers
      4. Alkalinizers
      5. Digestants
      6. Carminatives
      7. Emetics and anti-emetics
      8. Purgatives
      9. Antidiarrheics
      10. Cholagogues
      11. Anthelmintics

   C. Drugs having systemic action
      1. Anesthetics
      2. Intoxicants
      3. Analgesics
      4. Somnifacients
      5. Sedatives
      6. Convulsants

   D. Drugs acting on the autonomic nervous system
      1. Diaphoretics
      2. Mydriatics and miotics
      3. Cycloplegics

   E. Drugs acting on the circulatory system
      1. Cardiac stimulants and depressants
      2. Vasoconstrictors and vasodilators

   F. Drugs acting on the respiratory tract
      1. Respiratory stimulants and depressants
      2. Expectorants
      3. Antispasmodics

   G. Drugs acting on the blood and hematopoietic organs
      1. Hematinics and blood depressants
      2. Coagulants and anticoagulants
      3. Hemostatics and styptics

   H. Drugs acting on the reproductive system
      1. Emmenagogues
      2. Ecbolics
      3. Galactagogues

   I. Drugs acting on the urinary tract
      1. Diuretics and antidiuretics
      2. Acidizers and alkalinizers
      3. Antilithics

   J. Drugs which affect body temperature
      1. Pyretics and antipyretics

   K. Drugs affecting metabolism

   L. Drugs with a special action
      1. Prophylactics
      2. So-called specifics
      3. Antisyphilitics (antiluetics)
      4. Antiarthritics
      5. Antirheumatics
      6. Amebicides
      7. Anti-infectives
      8. Antibiotics
      9. Chemotherapeutic agents

Assignments of definitions reviewed at beginning of each unit during course.

2

Drugs Acting on Skin and Mucous Membrane

Lecture 3

1. Germicides, Bacteriostatic Agents, Deodorants
   A. Action - How they work
   B. Agents
      1. Phenol
      2. Cresol Compounds
      3. Mercury
         (a) Organic
            (2) Merbromine
            (2) Thimerosol
            (3) Nitromersol
         (b) Inorganic
            (1) Mercuric Chloride
            (2) Mercury Cyanide
            (3) Ammoniated Mercury
      4. Silver Compounds
         (a) Inorganic
            (1) Silver Nitrate
         (b) Organic
            (1) Mild Protein Silver
            (2) Strong Silver Protein
      5. Chlorine Compounds
         (a) Chlorinated Lime
         (b) Dakin's Solution
         (c) Chloramine T
         (d) Dichloramine T
         (e) Chloroazodin
      6. Iodine
      7. Oxidizing Agents
         (a) Hydrogen Peroxide
         (b) Zinc Peroxide
         (c) Potassium Permanganate
         (d) Sodium Perborate
      8. Alcohols
      9. Dyes
      10. Nitrofurazone
      11. Quarternary Ammonium Compounds
         (a) Benzalkonium Chloride
         (b) Phemerol
         (c) Ceepryn
      12. Formaldehyde
      13. Chlorophyll Preparations

2. Demulcents
   A. Gums and mucilages
   B. Vehicles

3. Emollients
   A. Petrolatum and oils
   B. Wool Fat
   C. Glycerin
   D. Ointments and lotions

4. Protectives
   A. Talc
   B. Zinc Stearate and Oxide
   C. Silicones and Aluminum

5. Reconstructives
   A. Scarlet Red
   B. Balsam Peru
   C. Enzymes

6. Irritants
   A. Rubifacients
   B. Vesicants
   C. Escharotics

7. Astringents, Styptics, Coagulants
compounds of -
   A. Lead
   B. Zinc
   C. Copper
   D. Silver
   E. Bismuth
   F. Tannic Acid

3

Drugs Acting on the Nervous System

Lecture 4

1. Central Nervous System
   A. Orientation
   B. Anatomy and Physiology
2. Central Nervous System Stimulants
   A. Caffeine
   B. Strychnine
   C. Nikethamide
   D. Pentylenetetrazole
   E. Picrotoxin
   F. Amphetamine
   G. Atropine
   H. Ammonia, Camphor
   I. Cocaine
   J. Ephedrine

Lecture 5

1. Central Nervous System Depressants
   A. Analgesics
      1. Opium
         (a) Morphine
         (b) Codeine
         (c) Others
      2. Synthetic Narcotics
         (a) Meperidine
         (b) Methadone
         (c) Others
   B. Action and uses
   C. Poisoning and addiction
   D. Laws

Lecture 6

1. Central Nervous System Depressants (continued)
   A. Hypnotics
      1. Barbiturates
         (a) Action and uses
         (b) Preparations
      2. Chloral Hydrate
      3. Paraldehyde
   B. Anticonvulsants
      1. Phenantoins
      2. Trimethadione
      3. Barbiturates
   C. Sedatives
      1. Bromides
      2. Barbiturates
      3. Valerian
   D. Analgesic - Antipyretics
      1. Salicylates
      2. Antipyrine
      3. Acetophenetidin
      4. Acetanilid
   E. Anesthetic agents, systemic
      1. Ether
      2. Chloroform
      3. Vinyl Ether
      4. Nitrous Oxide
      5. Ethylene
      6. Cyclopropane
      7. Tribromethanol
      8. Intravenous Barbiturates
      9. Trichloroethylene
   F. Associated agents
      1. Curare
      2. Succinylcholine Chloride
      3. Methoxamine
   G. Local
      1. Cocaine
      2. Procaine
      3. Tetracaine
      4. Others

Lecture 7

1. Physiology of Autonomic Nervous System
2. Drugs Acting on Parasympathetic Nerve Ending
3. Parasympathomimetics
   A. Pilocarpine
   B. Physostigmine
   C. Neostigmine
   D. Methacholine
   E. Carbachol
   F. Nicotine
   G. Bethanechol
   H. Muscarine

Lecture 8

1. Parasympatholytics
   A. Atropine (Belladonna)
   B. Hyoscine (Hyoscyamus)
   C. Papaverine
   D. Methantheline and Propantheline
   E. Adiphenine
   F. Panparnit
   G. Others

Lecture 9

1. Drugs Acting on Sympathetic Nerve Endings
2. Sympathomimetics
   A. Epinephrine
   B. Levarterenol
   C. Ephedrine
   D. Phenylephrine
   E. Aludrine
   F. 2-Aminoheptane
   G. Others
3. Sympatholytics (Hypotensives)
   A. Hydralazine
   B. Phentolamine
   C. Piperoxane
   D. Tolazoline
   E. Hexamethonium Chloride
   F. Dibenamine - Dibenzylene
   G. Dihydroergocornine
4. Autonomic Blocking Agents
   A. Curare - d-Tubocurarine
   B. TEAC

Lecture 10

1. Review of Autonomic Drugs
2. Antihistaminic Drugs

4

Drugs Used For Action on Respiratory Tract and Emetics

Lecture 11

1. Respiratory Stimulants
   A. Carbon Dioxide
   B. Picrotoxin
   C. Pentylenetetrazole
   D. Nikethamide
   E. Xanthine Derivatives
   F. Epinephrine
   G. Amphetamine
   H. Ephedrine
   I. Strychnine
   J. Atropine
   K. Ammonia
   L. Alcohol
2. Expectorants and Emetics
   A. Expectorants
      1. Nauseant Expectorants
      2. Demulcent Expectorants
      3. Saline Expectorants
      4. Alkaline Expectorants
      5. Irritant Expectorants

B. Emetics
1. Apomorphine
2. Other Emetics
(a) Zinc Sulfate
(b) Copper Sulfate
(c) Syrup Ipecac
(d) Mustard

5

Drugs Acting on the Circulatory System

Lecture 12

1. Cardiac Drugs
A. Stimulants
1. Digitalis Group
(a) Digitalis (Purpurea and Lanata)
(1) Digitoxin
(2) Digoxin
(3) Lanatoside C
(b) Strophanthus
(1) Strophanthin G (Ouabain)
(c) Squill
(1) Scillaren
B. Other agents
(a) Atropine
(b) Caffeine
(c) Epinephrine
(d) Pentylenetetrazole
(e) Nikethamide

Lecture 13

1. Cardiac Depressants
A. Quinidine
B. Veratrum
2. Vasodilators and Hypotensives
A. Nitrite Group
B. Xanthine Group
C. Papaverine - Paveril
D. Thiocyanates
E. Khellin
F. Rauwolfia Serpentina
(a) Reserpine
G. Hydralazine
H. Protoveratrine
I. Hexamethonium Chloride
J. Nicotinic Acid
K. Histamine

Lecture 14

1. Vasoconstrictors (Parenteral)
A. Epinephrine
B. Ephedrine
C. Phenylephrine
D. Mephentermine Sulfate (Wyamine)

Lecture 15

1. Blood Constituents and Fractions
2. Hemostatics and Styptics
A. Oxidized cellulose
B. Thrombin
C. Gelatin foam
D. Caustics and astringents
1. Salts of heavy metals
3. Vasoconstrictors (Local)
4. Anticoagulants
A. Sodium Citrate, ACD Solution
B. Heparin
C. Dicumarol
D. Others
5. Coagulants
A. Vitamin K
1. Analogues
B. Vitamin K_1
C. Protamine Sulfate
D. Toluidine Blue

Lecture 16

1. Hemopoietic Agents
A. Iron Compounds
B. Liver Extracts
C. Vitamin B_{12}
D. Folic Acid
E. Catalysts
2. Blood Depressants
A. Treatment of Polycythemia Vera and Leukemia etc.
1. Isotopes
2. Urethan
3. Nitrogen Mustards
4. Others used to treat malignancies

6

Chemotherapeutic Agents, Antibiotics and Biologicals

Lecture 17

1. So-called Specifics and Chemotherapeutic Agents—History
A. Antiprotozoan Agents (Antiluetics)
1. Mercury
2. Arsenic Preparations
3. Bismuth
4. Iodides
B. Plasmodicides (Antimalarials)
1. Quinine
2. Quinacrine
3. Chloroquine
4. Pamaquine
5. Amodiaquine
C. Amebicides
1. Ipecac - Emetine
D. Rheumatic Fever
1. Salicylates
E. Gout
1. Colchicine
F. Leprosy
1. Chaulmoogra oil
2. Promin, Promizole
G. Sulfonamides
1. Sulfanilamide
2. Sulfapyridine
3. Sulfathiazole
4. Sulfadiazine
5. Sulfacetamide
6. Phthalylsulfathiazole
7. Succinylsulfathiazole
8. Sulfamerazine
9. Sulfamethazine
10. Sulfisoxazole
11. Others

Lecture 18

1. Antibiotics - History
A. Tyrothricin
B. Penicillin
C. Streptomycin
D. Bacitracin
E. Dihydrostreptomycin
F. Chlortetracycline
G. Oxytetracycline
H. Chloramphenicol
I. Tetracycline
J. Neomycin
K. Erythromycin
L. Others
2. Antitubercular Drugs
A. Para-aminosalicylic acid
B. Isoniazid and compounds

Lecture 19

1. Biological Preparations and Allergens
A. Passive - active immunity
B. Natural - acquired immunity
C. Agents which produce active immunity
1. Smallpox Vaccine
2. Rabies Vaccine
3. Typhoid Vaccine
4. Tetanus Toxoid
D. Agents which produce passive immunity
1. Diphtheria Antitoxin
2. Tetanus Antitoxin
3. Gas Gangrene Antitoxin
4. Scarlet Fever Antitoxin

E. Other preparations
F. Diagnostic Tests
   1. Tuberculin
   2. Schick Test
   3. Others
G. Other Serum and Blood Fractions
H. Allergens - Theory and Preparations
I. Antihistamines
   1. Products
J. Non-specific Protein Therapy
   1. Fever Producing Agents

7

Drugs Acting on the Gastrointestinal System

Lecture 20

1. Bitters and Stomachics
   A. Aromatic Oils
   B. Strychnine
   C. Quinine
   D. Gentian
2. Digestants and Enzymes
   A. Hydrochloric Acid
   B. Pepsin
   C. Pancreatin
   D. Takadiastase
   E. Bile and Dehydrocholic Acid
3. Carminatives
   A. Volatile Oils
   B. Cardamon
4. Antacids
   A. Sodium Bicarbonate
   B. Sodium Lactate
   C. Aluminum Hydroxide
   D. Resins

Lecture 21

1. Cathartics
   A. Mechanical - Bulk
   B. Saline
   C. Irritant
2. Intestinal Antiseptics and Anthelmintics
   A. Sulfonamides
   B. Antibiotics
   C. Chemicals
   D. Hexylresorcinol
   E. Male Fern
   F. Atabrine
   G. Others
3. Adsorbants and Antidiarrheics
   A. Charcoal
   B. Kaolin
   C. Pectin
   D. Aluminum Hydroxide
4. Radiopaque Materials
5. Diagnostic Test Materials

8

Glandular Extracts, Hormones and Synthetic Substitutes

Lecture 22

1. Insulin
2. Thyroid and Antithyroid Drugs
3. Parathyroid Extract and Calcium Therapy
4. Adrenal Cortex Extracts
   A. Desoxycorticosterone Acetate
   B. Cortisone and Hydrocortisone
   C. A.C.T.H.

Lecture 23

1. Pituitary Products
2. Ovarian Hormones and Related Synthetic Steroids
3. Male sex hormones
4. Other Drugs Acting on Reproductive System
   A. Emmenagogues
   B. Oxytocics

9

Vitamins and Aminoacids

Lecture 24

1. Preparations, Action and Uses
   A. Vitamin A
   B. B Complex Components
   C. Vitamin C
   D. Vitamin D
   E. Vitamin E
   F. Vitamin K, K1, and Analogues
   G. Vitamin P
   H. Other Vitamins
   I. Discussion of essential aminoacids; preparations and therapeutic use.

10

Electrolytes, Water Balance, Parenteral Fluids

Lecture 25

1. Theories
2. Preparations
3. Indications
4. Treatment and Usage

11

Diuretics and Urologic Agents

Lecture 26

1. Diuretics
   A. Stimulant
   B. Saline
   C. Circulatory
   D. Mercurial Preparations
2. Urinary Antiseptics
   A. Chemotherapy and Antibiotics
   B. Methenamine Mandelate
   C. Local Agents
3. Drugs Which Alter pH of Urine
4. Antilithics
5. Diagnostic Agents

12

Toxicology and Review

Lecture 27

1. Toxicology
   A. Definitions
   B. Classification of Poisons
   C. Types of Antidotes
   D. Treatment Procedure
   E. Systemic and Supportive Treatment

Lecture 28

1. Prescription and Dispensing System
2. Review of Metric System
3. Formulary System

Lecture 29

1. Review of Synonyms and Dosage

Lecture 30

1. Review of Course
2. Emphasis on Most Important Drugs
3. Summary

Final Examination.

LECTURES TO THE RESIDENT STAFF

which may be presented by

HOSPITAL PHARMACISTS

Submitted as part of 1954 Report of ASHP Committee on Minimum Standards

1

Orientation To Pharmacy Services

Lecture 1

This is the first of a series of four lectures and should be presented in the form of a welcome and an orientation to the new members of the resident staff. It may or may not be part of the hospital's orientation program. It is suggested that the following topics be mentioned briefly, allowing adequate time for questions.

I. General statement of welcome
   A. Happy that you are here
   B. Look forward to working with you and getting to know each of you personally
   C. Pharmacy department staff is anxious to help you in any way possible
   D. We hope that you will find time to visit our department during the next few days

II. Describe Pharmacy Department
   A. Location
   B. Physical plant
   C. Personnel
   D. Hours of operation
   E. After hours pharmacy service

III. Pharmacy Department Service
   A. Provide pharmaceuticals and diagnostic agents
      1. Inpatients
      2. Outpatients
      3. Employees
   B. Information and reference service for professional staff
      1. Library
      2. Reprints
      3. Product Information

IV. Hospital Policies Governing the Prescribing of Drugs
   A. Stock drug list
   B. Formulary
   C. Dosage units
      1. Metric system
      2. Apothecary system
   D. Use of generic names
   E. Approved abbreviations
   F. Use of sample medication
   G. Use of investigational drugs
   H. Special drug orders
   I. Narcotic and liquor prescriptions
   J. Discharge medication
   K. Quantity of drugs prescribed
   L. Refilling prescriptions
   M. Medication for personal use

V. Pharmaceutical Detail Men
   A. Method of contact
      1. Appointment only
      2. Hospital displays

Members of the 1954 Committee on Minimum Standards of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS were: Walter Frazier, *Chairman;* Alice Appel, Grover C. Bowles, W. Arthur Purdum; and John J. Zugich.

2
The Formulary System

Lecture 2

This is the second lecture of the series and deals with the formulary system. The pharmacist must stress the philosophy and goals of the formulary system. It is important that the new resident staff understand that the Pharmacy and Therapeutics Committee is a medical staff committee and that suggestions for additions or deletions to the formulary are welcome.

I. Pharmacy and Therapeutics Committee
  A. Function
  B. Method of appointment
  C. Membership
    1. Name and qualifications of each member
  D. Method of presenting suggestions
II. Define the Formulary System
III. Outline Contents of the Formulary
  A. Table of contents
  B. General information
  C. Antidotes
  D. Prescription writing
  E. Conversion tables
  F. Cross index
  G. Monographs
IV. Advantages of the Formulary System
  A. Assures sound therapeutic program
  B. Reduces cost of medication to patient

3
Prescription Clinic

Lecture 3

It is suggested that the third lecture take the form of a prescription clinic. By this time, you will be fairly well acquainted with the resident staff and will have some insight into their ability to write prescriptions properly. As in the other lectures, the distribution of mimeographed material will be helpful in getting your points across. Be specific, brief and leave plenty of time for discussion. You might also take actual prescriptions from your files to demonstrate specific points.

I. Define a Prescription
II. Discuss the Legal Aspects of the Prescription
III. Review Advantages of the Metric System
IV. Review Advantages of Generic Terminology
V. Point Out Importance of Adequate Information
  A. Patient's full name (correctly spelled)
  B. Address of patient or hospital location
  C. Age of patient
  D. Hospital unit number
  E. Precise directions
  F. Proper signature
VI. State and Federal Regulations Regarding Prescriptions for Narcotics and Hypnotics
VII. Hospital Regulations Regarding Prescriptions
VIII. Common Errors
  A. Illegible writing
  B. Attempt to use Latin in place of English
  C. Misplaced decimal points
  D. Non-standard abbreviations

4
Current Trends

Lecture 4

The fourth lecture could deal with any point of current interest. The cost of medication is a topic which is or certainly should be, of major interest to everyone, and of particular interest to the young physician. Duplication and substitution might also be included in this lecture. Supplement your remarks with specific examples of patient's drug bill.

I. The Current Cost of Antibiotics
  A. Penicillin
  B. Streptomycin
  C. Broad spectrum antibiotics
  D. Others
II. The Current Cost of the Commonly Used Steroid Hormones
  A. ACTH.
  B. Cortisone
  C. Estrogens
  D. Antrogens
III. Comparative Costs of Oral and Injectible Medication
  A. Tetracycline, chlortetracycline, and oxytetracycline
  B. Digitalis preparations
  C. Cortisone
  D. Vitamins
  E. Others depending on current use in your hospital
IV. Give Specific Examples of Drug Costs to Treat Certain Illnesses
V. Give Brief Discussion on Prescription Pricing

A REPORT ON THE STERILE MANUFACTURE OF THEM

by HYMAN ALTBACH
and FRANK MAZZAPICA

THE ESSENTIAL REQUIREMENTS of an ophthalmic solution are pharmacologic effectiveness, freedom from irritancy (unless the latter is part of the desired pharmacologic effect), stability, and sterility. Meeting all four requirements has proved to be a difficult problem in some instances[1], but if one buffers the solution to a *p*H which will give stability while exerting maximum therapeutic effect and then sterilizes the solution, most of the aforementioned criteria will have been satisfied. It is also necessary to add a chemical preservative to the solution to maintain sterility, or to prevent subsequent bacterial multiplication if the solution is exposed to contamination under conditions of use on the wards, or by the patient at home. Many drugs and chemicals have been recommended for use as preservatives in ophthalmic medications. Some of these are benzalkonium,[3] chlorobutanol,[4] sodium ethyl mercuri thiosalicylate,[4] phenyl ethyl alcohol,[5] and others.

McCulloch prepared ophthalmic solutions to which he added one drop of a 24 hour broth culture of *Ps. aeruginosa* per each 5 ml. of solution. To these he added Merthiolate 1:20,000, Meta-

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phen 1:7,000, and chlorobutanol, 0.3 percent. All solutions were free of *pyocyaneus* except physostigmine, which was freed from contamination by Merthiolate 1:7,000 and Metaphen 1:2,000.[3]

The Pharmacy Service of the Brooklyn VA Hospital has for the past year prepared ophthalmic medications as buffered, chemically preserved, and sterile solutions and has, during the period, evaluated the effectiveness of its procedures on the basis of three criteria: 1. The degree of sterility of solutions as prepared in the Pharmacy; 2. The length of time these solutions remained sterile after they were sealed; and 3. Most important, the length of time these solutions remained sterile or relatively free from bacteria after they had been dispensed to the using service, where they were exposed to contamination approximately 12 times per day.

In tabulating the sterility data on ophthalmic solutions at the time of manufacture by the Pharmacy Service, it was found that of 25 lots manufactured, 24 lots had no growth after 72 to 96 hours incubation. It was then deemed advisable to determine the length of time that these solutions would remain sterile after they were capped, sealed, and stored for varying periods of time; that is, to arrive at an effective shelf-life of these solutions. More important, however, was the determination of the length of time that these solutions would remain sterile or relatively free from bacteria after they had been dispensed to the using services, where they were opened approximately three times a day to be administered to an average of four patients daily, and for an average total of 12 exposures per day per bottle.

Equipment Used:[2]

2 dram dropper bottles
Selas porcelain candle VFA — 88 — 02
Mantle and standard stopper for 1 liter flask
1,000 ml. Pyrex filter flask, glass funnels, suction filter
Fluorescent desk lamp fitted with G.E. Germicidal lamp transmitting ultra violet radiation at 2580 A.U.
Sterile Abbott 1 liter bottle and Venopak.

Method:

All glassware in contact with the solution to be filtered was autoclaved at 15 lbs. (121.5 degrees C) for 20 minutes. Glassware was first cleaned with Haemo-Sol, washed three times with tap water, and then rinsed three times with freshly distilled water. The glassware was then dried and autoclaved. The dropper bottles were capped loosely to prevent collapse of the rubber stoppers. Before use, the candle was washed with a hot solution of HCl (1:3), then thoroughly rinsed with distilled water until free of acid when tested with litmus. After two filtrations, the candle was ignited at 2,000 degrees Fahrenheit to destroy any organic material or other contaminants which could not be dissolved out by the hydrochloric acid wash and rinse. A 0.5 percent chlorobutanol solution was prepared in freshly distilled water, this solution being used as the vehicle for the preparation of the buffer solutions.

Since Gifford's buffers were used throughout, stock solutions 1 and 2 were prepared and then mixed in the correct proportion to produce the buffer solution of the *p*H desired.[6] (The formulas for Gifford's stock solutions together with the chart for preparing buffer solutions of the required *p*H are listed in *Remington's Practice of Pharmacy, Tenth Edition,* page 238). The correct amount of alkaloid was then weighed, and the buffer added to make the desired quantity of solution. It has been shown, and we too have found, that the addition of alkaloids in the strengths commonly employed does not modify the *p*H more than 0.2 units.[7]

The solution was filtered under the ultraviolet lamp with the aid of suction and transferred aseptically into the sterile Abboliter, which was then fitted with the sterile Venopak. The Abboliter was then inverted and placed on a ring stand or a metal IV tree and the contents transferred aseptically into the two-dram dropper bottles, which were then capped and sealed with Dupont Cel-O-Seals. A lot number was assigned to the batch and a sample was taken for sterility tests.

In order to insure that representative samples of the filtering procedure were chosen, we selected the first and last bottles capped, and one bottle halfway through the filtering process. These were sent to the Bacteriology Laboratory for sterility tests and the lot then placed in stock to await the sterility report before it was issued.

Samples of several lots of ophthalmic solutions, as indicated in Fig. 1, were set aside under normal storage conditions in the Pharmacy in order to determine the length of time that sterility would be maintained. The solutions were chosen for test at random from Pharmacy stocks, manufactured previously on the dates indicated in Fig. 1 and reported sterile at the time.

Samples were then removed from the Ophthalmology service at two successive intervals representing solutions which had been sent to them on request. They had been opened and administered to patients an average of 12 times a day per bottle. The first batch was removed from the ward after being used for from 18 days to more than 4 months. (See Fig. 2). (Since it was anticipated that the solutions had become contaminated in use, pour plates were made to determine the bacterial count, in addition to the broth cultures.) The second set of ophthalmic solutions was tested for sterility after 11 days use on the ward. (See Fig. 3). In this instance, pour plates were made as above, but in order to recover even a very few organisms which might be present in the solutions, the latter were centrifuged and the sediments inoculated into broth.

In order to determine the bactericidal action of the solutions on gross contamination with *Ps. aeruginosa,* the supernatant fluids remaining after the second set of solutions had been centrifuged were contaminated with the abovementioned organism and were observed for increase or decrease in the number of living bacteria. For this purpose, an 18 hour infusion broth (Difco) culture of *Ps. aeruginosa* was diluted with water and 1 ml. of a 1:100,000 dilution was inoculated into each of the supernatant fluids. These inoculated fluids were left standing at room temperature, and each day, a count of the number of viable organisms was performed.

LOT NO.	SOLUTION	DATE MFG.	DATE TEST	GROWTH
At-102	ATROPINE 1%	12/9/53	5/6/54	NONE
Sc-101	SCOPOLAMINE 1/4%	4/21/53	5/6/54	NONE
Zn-104	ZINC-ADRENALIN STOCK SOLUTION 1/4 % Zn	1/12/54	5/6/54	NONE
Ho-102	HOMATROPINE 2%	8/5/53	5/6/54	NONE
Ho-101	HOMATROPINE 1%	4/15/53	3/31/54	NONE
Po-101	PONTOCAINE 1/2 %	3/17/53	4/15/54	NONE
Di-101	DIONIN 1/2 %	5/19/53	4/15/54	NONE
Di-201	DIONIN 1 %	5/19/53	4/15/54	NONE
PEC-102	PILOCARPINE ESERINE COCAINE SOLUTION	10/8/53	4/14/54	NONE

FIG. 1 RESULTS OF STERILITY TESTS AFTER STORAGE IN THE PHARMACY

LOT NO.	SOLUTION	DATE ISSUED TO WARD	DATE REMOVED FROM WARD	GROWTH
At-102	ATROPINE 1%	2/19/54	4/2/54	NONE
Po-102	PONTOCAINE 1/2 %	12/14/53	4/2/54	NONE
Ho-102	HOMATROPINE 2 %	12/14/53	4/2/54	NONE
Pi-101	PILOCARPINE 1 %	11/23/53	4/2/54	NONE
Zn-104	Zn-ADRENALIN	3/15/54	4/2/54	NONE
Sc-102	SCOPOLAMINE 1/4 %	12/14/53	4/2/54	NONE

FIG 2 SOLUTIONS REMOVED FROM WARD AFTER BEING OPENED AND ADMINISTERED TO PATIENTS

LOT NO.	GROWTH	SOLUTION	ISSUED TO WARD	REMOVED FROM WARD	GROWTH
Po-102	NONE	PONTOCAINE 1/2 %	4/16/54	4/27/54	NONE
Ho-102	NONE	HOMATROPINE 2 %	4/16/54	4/27/54	NONE
At-102	NONE	ATROPINE 1%	4/16/54	4/27/54	NONE
Pi-101	NONE	PILOCARPINE 1%	4/16/54	4/27/54	NONE
Sc-102	NONE	SCOPOLAMINE 1/4%	4/16/54	4/27/54	NONE

FIG 3 CENTRIFUGED SAMPLES SEDIMENT INOCULATED INTO BROTH

	HOURS				
	24	48	72	96	120
Po-101	0	0	0	0	0
Po-102	0	0	0	0	0
Ho-102	20	0	0	0	0
At-102	224	32	0	0	0
Pi-101	616	77	0	0	0
Sc-102	56	4	0	0	0
DIST. WATER CONTROL	>3000	>4000	>4000	>4000	>4000

FIG 4a COLONY COUNTS OF SUPERNATANT FLUID FROM CENTRIFUGED OPHTHALMIC SOLUTIONS CONTAMINATED Ps AERUGINOSA

	HOURS			
	24	48	72	144
Po-104	0	0	0	0
Zn-105	0	0	0	0
Sc-101	3	0	0	0
Pi-102	92	68	54	0
Ho-101	1	0	0	0
Pec-102	0	0	0	0
DIST WATER CONTROL	1,450	>200,000	>200,000	>200,000

FIG 4b SOLUTIONS CONTAMINATED WITH 36,500 Ps AERUGINOSA

A colony count at the time the solutions were inoculated revealed that about 3,000 organisms had been added to each solution.

Another series of six ophthalmic solutions was removed from Pharmacy stock and tested for sterility. To each of these was added 1 ml. of a 1:10,000 dilution of *Ps. aeruginosa*, and the inoculated solutions left standing at room temperature. Colony counts showed that about 36,500 organisms had been added to each of these solutions.

Results

1. Of 25 separate batches of ophthalmic solutions manufactured over a period of 13 months, all except one batch were reported as sterile for issue to the using services.

2. The samples chosen from lots manufactured, set aside in the Pharmacy under normal storage conditions and retested for sterility at the periods indicated in Figure 1, were still sterile.

3. Figure 2 shows results of bacteriological tests performed on first set of samples removed from the ward after being in use from 18 days to four months. All had maintained complete sterility. This chart shows results of bacteriological tests performed on these samples. All had maintained complete sterility.

4. A second set of samples removed from the ward was centrifuged and the sediment tested bacteriologically for contamination or for growth of any organisms. As shown by Figure 3 no growth was found.

5. Figure 4a shows the bactericidal effect of the previous solutions upon the organisms which were added. In each instance, the colony counts of the contaminating organisms in the ophthalmic solutions showed a marked decrease from day to day, and after 72 hours, all solutions showed zero colony counts. Distilled water suspensions of *Ps. aeruginosa* used as controls showed a marked increase in population.

6. Figure 4b shows the bactericidal effect of another series of 6 ophthalmic solutions on an inoculum of 36,500 organisms. All solutions except the pilocarpine were sterile after 48 hours. This solution was completely sterile at 144 hours.

Discussion

Heat sterilization of ophthalmic solutions, either by boiling or autoclaving, is widely used, especially in hospitals. With the exception of fluorescein, boric acid, sodium propionate, Metycaine, and Holocaine, as a general rule all ophthalmic medicaments, especially alkaloids, are altered in potency and in clinical character by heat sterilization. These changes accelerate the deterioration of the active drug.[2] For this reason, we have employed bacterial filtration using a ceramic filter as our method of sterilization.

The data listed in the charts designated as Figure 1, 2 and 3, have indicated that the ophthalmic solutions can maintain sterility for long periods of time if, from the beginning, they are prepared in a sterile manner. McCulloch has stated that if *pyocyaneus* is excluded from solutions when prepared in the Pharmacy, it is not likely to appear in the solutions on the using services. Solutions prepared as long as 13 months prior to testing were found to be sterile as were solutions which were opened on the wards for administration to patients. The solutions on the using services which were in the process of being administered to patients were opened 12 times a day while being administered to patients. This provides ample opportunity for contamination by pathogenic organisms or air-borne bacteria and by solid particles which may be inadvertently brushed off on the dropper.

The experiments performed by contaminating the supernatant fluids with 3,000 organisms and 6 other solutions with 36,500 organisms represent bacterial counts far in excess of that which might contaminate an eye dropper by inadvertently brushing against the eye lid or by exposure to air. Since the results have shown the absence of any organisms in these solutions except the one containing pilocarpine, and these being representative of most alkaloids used as eye medication, we must assume that chlorobutanol in the concentration used, is a potent bactericidal as well as a bacteriostatic agent. Theodore and Feinstein[2] have stated "that chlorobutanol and Merthiolate are advocated as preservatives because they are compatible with all commonly used ophthalmic drugs, they appear more effective against *Ps. aeruginosa,* and are not inactivated by body fluids." Of the two, chlorobutanol is preferable because sensitivities to it have not been encountered in our experience and must be extremely rare. Quaternary ammonium compounds are not compatible with fluorescein or salicylate or nitrate radicals, and may be inactivated by soaps.[2] Our choice of using chlorobutanol, therefore was based on the above statements, and the desire to use one antibacterial agent for all ophthalmic solutions prepared by us.

The solutions were buffered to the required *p*H in order to make the solution more acceptable to the patient while still maintaining therapeutic activity. Tests have shown that after storage, the *p*H of the medication is not altered and that activity of all alkaloids has not materially decreased. This was shown by measuring the degree of miosis produced in one eye by a freshly prepared solution of pilocarpine, against the effect produced by an "old" solution in the other eye. Miosis produced was equal, and was sustained for the same length of time in both eyes. Blok[8] found that a sterile solution of pilocarpine in distilled water had decomposed only slightly after 5½ years as estimated by optical rotation. Consultations with the ophthalmologist and the nursing staff have elicited the fact that objectively, they have noticed no marked degree of irritation upon administration of these eye solutions, and subjectively, the patients have not indicated any degree of irritancy when being treated with these solutions.

No attempt has been made up to the present time, to determine what happens to the ophthalmic medications dispensed to outpatients. It would be interesting to determine whether results obtained by testing these would coincide with those herein reported.

Summary

1. Of 25 batches of solutions prepared as described for the Ophthalmology Service for use as eye medications, 24 batches were found to contain no growth upon bacteriologic examination.
2. These solutions remained sterile under normal storage conditions for periods up to 13 months.
3. Two batches of solutions removed from the Ophthalmological Service, after having been opened and administered to patients for varying periods of time, had maintained complete sterility.
4. Deliberate gross contamination of ophthalmic solutions with *Ps. aeruginosa* resulted in the subsequent sterilization of most of the solutions. This showed a bactericidal as well as a bacteriostatic action due to chlorobutanol.
5. It was noted that there was very little reduction in therapeutic effect due to the long storage of the medications.

Acknowledgment

The authors wish to thank Mr. Samuel Blier and Mr. Victor E. Heinrich of the Pharmacy staff for their assistance and cooperation in preparing this report. We also wish to acknowledge the assistance of Dr. Philip Schain, Chief of the Clinical Laboratory, for the many consultations and helpful suggestions which he made to assist in the completion of this report.

References

1. Floyd, G., Kronfeld, P. C., and McDonald, J. E.: *J. Am. Pharm. Assoc., Sci. Ed. 42*:333 (June) 1953.
2. Theodore, F. H. and Feinstein, R. R.: *Am. J. Ophthalmol. 35*:656 (May) 1952.
3. Scigliano, J. A. and Skolaut, M. W.: *Bull Am. Soc. Hosp. Pharm. 11*:37 (Jan.-Feb.) 1954.
4. McCulloch, J. C.: *Arch Ophthalmol. 29*:924, 1943.
5. Brewer, J., Goldstein, S. W., and McLaughlin, C. B.: *J. Am. Pharm. Assoc., Sci. Ed. 42*:584 (Sept.) 1953.
6. Gifford, S. R. and Smith, R. D.: *Arch Ophthalmol. 9*:227, 1933.
7. Gifford, S. R.: *Arch. Ophthalmol. 13*:79, 1953.
8. Blok, C. J.: *Ophthalmologica 108*:217, 1944.

How do you measure NEEDLE LENGTH?

by MILTON W. SKOLAUT
and
JOSEPH N. SALVINO

HYPODERMIC NEEDLE manufacturers are marking the gauge on the hub of all standard needles. However, the needle length has to be determined by measuring with a ruler or guessing. This is time consuming and where accuracy is necessary, guessing is unsatisfactory.

To meet this need a simple device for measuring needle length has been produced as shown in the accompanying view. The instrument may be fabricated as in the photograph, or reversed to show the length from right to left; whichever is most convenient for the user.

By using such a device, an individual may measure accurately more needles per hour, with less fatigue.

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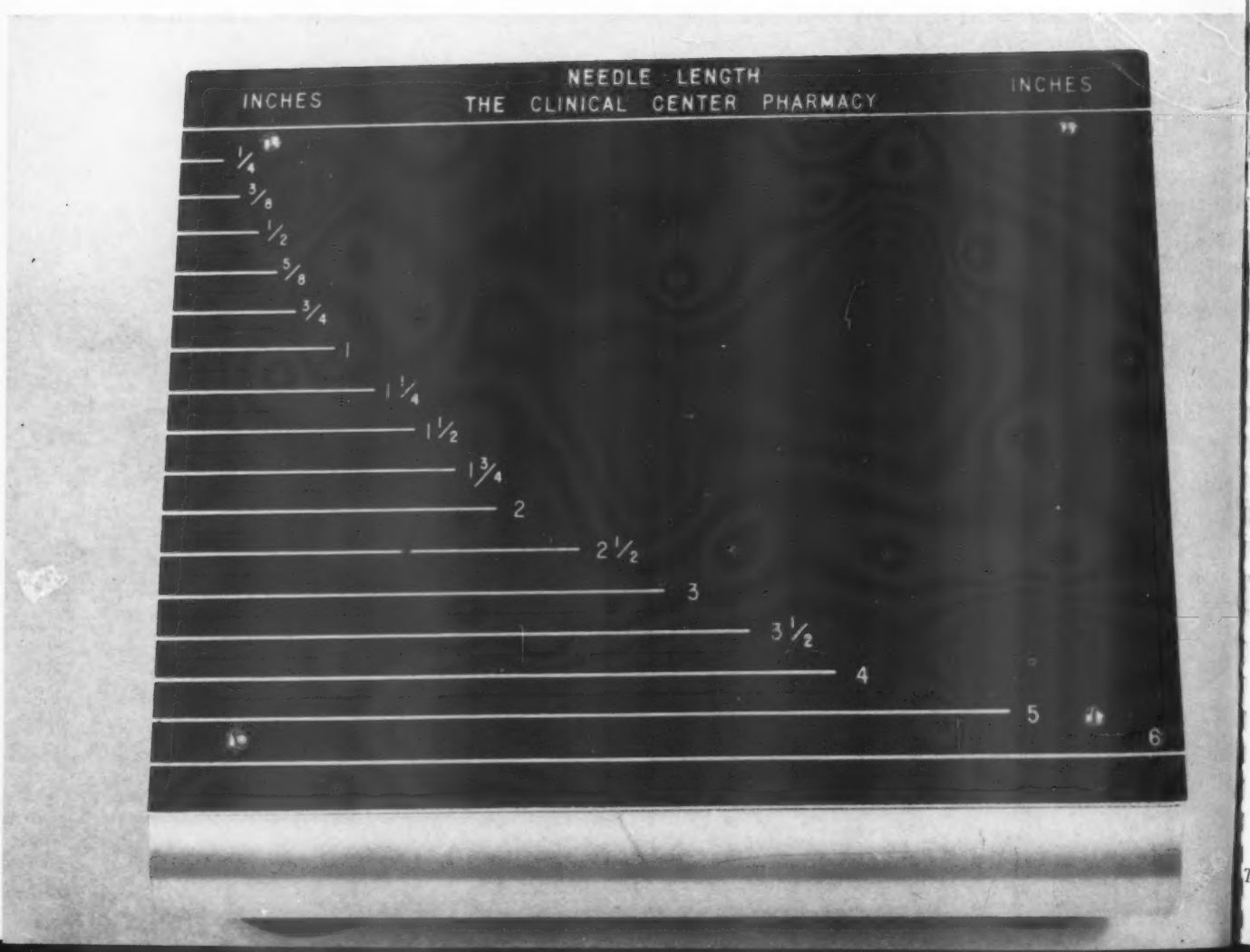

Let's be Rational

by L. F. Tice

In the efforts of some well-intentioned persons to curb the pernicious and unethical practice of substitution, certain positions have been taken and statements made which must not go unchallenged.

We are firmly opposed to substitution in all its forms, whether it be the dispensing of counterfeit items or brand substitution unknown to and unauthorized by the prescribing physician. So, too, are we opposed to the ARB plan which we attacked editorially on these pages when it was a much discussed issue and before it was properly laid at rest.

There are, however, certain prerogatives belonging to every pharmacist which are irrevocably his and must remain so. These, when grouped in the same category as substitution, do much to weaken the case against substitution and may even alienate many honest and conscientious pharmacists from the forces now opposing it. It is to certain of these prerogatives that we wish to draw attention.

Any and every pharmacist has the inalienable right, when some brand of a drug is prescribed, to ask the physician for his authorization to dispense a brand other than prescribed. It is not always feasible to stock every brand of every drug; in fact, it is impossible. Now, it is, of course, assumed that the brand suggested in place of that prescribed is a good one and that the approval of the physician is obtained in each specific instance and not as a blanket authorization. To argue that this is wrong has even less merit than the pharmacist's frequent argument that a manufacturer hasn't the right to duplicate something already on the market. To deny either would be contrary to our free economic system.

Another inviolate right of the pharmacist is to suggest to the physician that an *identical* drug sold under a variety of trade names be prescribed under its generic name or official title. This permits the pharmacist to dispense the brand in stock without the necessity of obtaining the physician's approval. As a case in point, we might take the drug tetracycline. Not only is this a costly drug but there are presently 5 brands identical in composition—some even being supplied to a given manufacturer by a competing company under license. Such a practice should not be confused with the ARB plan which suggested the use of *brand names followed by ARB*. This, we are against.

If we are not in error, we believe it to be standard practice to teach medical students to use official titles on their prescriptions and such is in accordance with the Code of Ethics of the American Medical Association. There is, furthermore, nothing in the Code of Ethics of the American Pharmaceutical Association against this.

While we can understand the unhappiness which this causes companies who strive hard to have their brand name used at all times, it is a little ridiculous to hear them cry out in anguish at the suggestion that this is not ethically or morally wrong. Their attitude on this then becomes as lacking in judgment and objectivity as that of retailers who argue that restrictions should be placed on the number of brands allowed on the market.

This is still a relatively free country and private enterprise, still an accepted economic policy. No group should expect the privileges and opportunities which the system provides without facing a few of its hazards. To impugn the ethics or morals of those who are acting within their professional or commercial rights is in bad taste. There is much to be done in cleaning up the nasty substitution situation without tilting at windmills.

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ABOVE: *Group attending the A.H.A. Institute at the University of Chicago in June.*

BELOW: *Panel Discussion on Fundamental Principals of Administration.* SEATED LEFT TO RIGHT: *M. R. Kneifl, Catholic Hospital Association; Ray E. Brown, University of Chicago Clinics; Donald Casley. Research and Educational Hospital, University of Illinois; Don E. Francke. University of Michigan Hospital; and Sarah Hardwicke, American Hospital Association.*

Photograph taken during one of the sessions of the A.H.A. Institute held at the University of Chicago in June.

INSTITUTES ON HOSPITAL PHARMACY 1955

HOSPITAL PHARMACY INSTITUTES and Seminars during recent months reflect an increased interest in continuing education. Over a period of ten years since our organizations first participated in sponsoring institutes, more than 2,000 hospital pharmacists have had an opportunity to attend a meeting of this type. Hospital pharmacists from all parts of the country representing different types and size institutions have participated in institutes each year.

A.H.A. Institute—Chicago

This year the American Hospital Association in cooperation with the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS is sponsoring two such meetings. The first, held at the University of Chicago during the week of June 13, was keyed to current trends and needs of hospital pharmacists in their day to day practice. Highlighting the meetings was a session at the University of Chicago Clinics demonstrating procedures for handling radioisotopes. At the University of Chicago Clinics the pharmacist is in charge of the radioisotope laboratory. Here the medications are stored and dosage forms prepared ready for administration to the patient. Clinicians participating in the program emphasized the important role of the pharmacist in this activity, pointing out the need for proper facilities and personnel.

Other outstanding features of the five-day session included a discussion on electrolytes, a demonstration on the procedure for carrying out the U. S.P. pyrogen test, and a presentation on "The Law of Hospital Pharmacy."

Facilities at the University of Chicago Campus were ideal for this type of meeting. Students were housed in dormitories with meetings and meals in adjacent buildings. This atmosphere offered many opportunities for informal discussions. Also of note was the active role taken by the hospital pharmacists in the Chicago Area, as well as the entire staff at the University of Chicago Clinics. On the opening night the Illinois Chapter of the ASHP sponsored a Social Evening with group singing, entertainment and refreshments.

C.H.A. Institute—St. Louis

The Catholic Hospital Association in cooperation with the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS sponsored an institute in conjunction with the Association's annual convention in St. Louis, May 14-17. The program was based on the general theme of the Convention, "The Road Ahead," with emphasis on the professional, administrative and educational aspects of pharmaceutical service. The C.H.A.'s Committee on Pharmacy Practice, headed by Sister M. Ancilla, S.S.J., St. Joseph's Hospital, Hamilton, Ontario, Canada, along with Mr. M. R. Kneifl, Executive Secretary of the C.H.A., was in charge of the program.

The Rt. Rev. Msgr. Edmund J. Goebel, President of The Catholic Hospital Association, extended greetings at the opening session. Mr. Milton W. Skolaut, Vice-President of the ASHP was present to bring greetings from the national group. During the week, leaders in hospital pharmacy and allied fields participated in the four-day institute. Among the faculty members were: Dr. James R. Thayer, Associate Dean, St. Louis College of Pharmacy; Dr. Robert Schleif, Assistant Professor of Pharmacy, St. Louis College of Pharmacy; Mr. Frank E. Kunkel, Our Lady of Mercy Hospital, Cincinnati, Ohio; Dr. Philip Comens, Department of Internal Medicine, Washington University, St. Louis, Mo.; Dr. Don E. Francke, University Hospital, Ann Arbor, Mich.; Rev. Harry B. Crimmins, S.J., Florissant, Mo.; Rev. Gerald Kelly, S.J., St. Marys, Kans.; Dean Wm. A. Jarret, Creighton University, Omaha, Nebr.; Mrs. Evlyn Gray Scott, St. Luke's Hospital, Cleveland, Ohio; Mr. Ralph J. Merisicky, Firmin Deslodge Hospital, St. Louis, Mo.; Dr. Paul L. Wermer, American Medical Association, Chicago, Ill.; Rev. Trafford Maher, S.J., St. Louis University, St. Louis, Mo.; Mr.

C.H.A. Institute, View of General Session. (L. TO R.) *ASHP Vice-President Milton W. Skolaut, presiding; Sister Mary John, R.S.M., Chief Pharmacist, Mercy Hospital, Toledo, Ohio; Rev. Trafford Maher, S.J., St. Louis University; Sister M. Rebecca, O.S.B., St. Benedict's Hospital, Ogden, Utah; Thomas Sisk, Chief Pharmacist, St. Joseph's Hospital, Lorain, Ohio; Don E. Francke, Editor of* THE BULLETIN *and Chief Pharmacist, University of Michigan Hospital; and John J. Zugich, Assistant Director, University of Michigan Hospital, Ann Arbor, Mich.*

C.H.A. Institute, General Session. (L. TO R.) *Dean L. C. Zopf, University of Iowa, College of Pharmacy, Iowa City, Iowa; Sister M. Ancilla, S.S.J., St. Joseph's Hospital, Hamilton, Ont.; Sister M. Berenice, S.S.M., St. Mary's Hospital, St. Louis, Mo.; Sister M. Quentin, O.S.F., St. Mary's Hospital, Rochester, Minn.; Gloria Niemeyer, Secretary,* AMERICAN SOCIETY OF HOSPITAL PHARMACISTS; *Sister M. Florentine, C.S.C., Mount Carmel Hospital, Columbus, Ohio; Andrew J. Bartilucci, Ph.D., Assistant Dean, St. John's University College of Pharmacy, Brooklyn, N. Y.*

C.H.A. Institute, Closing Session. (L. TO R.) *Sister Marian, S.C., St. Elizabeth's Hospital, Elizabeth, N. J.; Sister M. Ancilla, S.S.J., St. Joseph's Hospital, Hamilton, Ont.; Evlyn Gray Scott, Director of Pharmacy Services, St. Luke's Hospital, Cleveland, Ohio; Louis Gdalman, Director of Pharmacy Services, St. Luke's Hospital, Chicago, Ill.; and Allen V. R. Beck, Chief Pharmacist, Indiana Medical Center, Indianapolis, Ind.*

Thomas Sisk, St. Joseph's Hospital, Lorain, Ohio; Mr. Louis Gdalman, St. Luke's Hospital, Chicago, Ill.; Mr. John J. Zugich, University Hospital, Ann Arbor, Mich.; Miss Gloria Niemeyer, AMERICAN SOCIETY OF HOSPITAL PHARMACISTS, Washington, D. C.; and Dean L. C. Zopf, University of Iowa College of Pharmacy, Iowa City, Ia. A number of Sister Pharmacists also participated.

Highlights of the institute included discussions on pharmaceutical services for small hospitals, new drugs, ethical problems in hospital pharmacy practice, preparation of ophthalmic solutions, diagnostic agents and factors in prescription pricing.

At the business session on Tuesday, Sister M. Alberta of St. Vincent de Paul Hospital in Brockville, Ontario, was elected to succeed Sister M. Ancilla as a member of the C.H.A.'s Committee on Hospital Pharmacy Practice.

The following resolutions were passed:

Whereas the administrators of many small hospitals which do not now enjoy the services of a registered pharmacist are not cognizant of means whereby they may provide pharmaceutical services and protection for their patients,

Be it resolved that the Committee on Hospital Pharmacy Practice convey to such administrators information and advice on means of providing such services based on ideas presented at this Institute.

Whereas a wide variation of prices in a given area result in poor public relations,

Be it resolved that pharmacists in hospitals be encouraged to adopt a standard pricing formula for prescriptions for use in their hospitals.

Whereas it is pointed out in the Minimum Standard for Pharmacies in Hospitals that the teaching activities of the hospital pharmacist include nurses, pharmacy interns and medical interns,

Be it resolved that the Colleges of Pharmacy be approached to institute refresher courses to enable hospital pharmacists to carry out these teaching acivities more efficiently.

Whereas it is realized that the development of the National Hospital Formulary Service is strongly recommended as a means of providing the best type of pharmaceutical service in our hospitals,

Be it resolved that this Institute record its approval of the formulary service proposed by Dr. Don Francke as an aid in the preparation of such formularies by the hospital pharmacist, which project is presently under study by special committees of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

Be it resolved that thanks be expressed to those who brought greetings to this the Seventh Annual Institute for Hospital Pharmacists, namely, Dr. J. R. Thayer from the St. Louis College of Pharmacy and Mr. Milton Skolaut from the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS.

Be it resolved that we express our thanks and appreciation to all those whose presence here and contributions to the program made this Institute so instructive and enjoyable.

Whereas Mr. Oliver Steppig has been a great support to the Committee on Hospital Pharmacy Practice; and

Whereas he has made many contributions to the profession of Pharmacy as a whole,

Be it resolved that this group express thanks and appreciation for these contributions.

ISOTOPES COURSE

for hospital pharmacists

Herbert L. Flack, Director of Pharmacy Service at Jefferson Hospital, Philadelphia, accepts a grant from the Smith, Kline and French Laboratories for five residents in hospital pharmacy to participate in the radioisotope course offered in June. Presenting the grant (left) is G. Frazier Cheston, head of the Hospital Sales Service Section at S.K.F.

THE PHILADELPHIA College of Pharmacy and Science and the Philadelphia Hospital Pharmacists Association are cooperating in offering a Course on Radioisotope Techniques. The Course is designed for hospital pharmacists and is open to those practicing throughout the country. Laboratory experiments, lectures, films, and demonstrations will commence on Monday, October 31, and continue with morning and afternoon sessions through November 11. Sessions will be held in the Chemistry Laboratories of the Philadelphia College. Meetings will be scheduled from 9 A.M. to 5 P.M. daily with sessions during the morning of the first Saturday.

The Course has been planned and will be conducted by Dr. Grafton D. Chase, of the Philadelphia College faculty, under the direction of Dr. Arthur Osol, head of the Chemistry Department, both of whom have had considerable experience in this field and have attended courses of instruction at Oak Ridge Institute of Nuclear Studies. Mr Basil Ketcham, Mr. Herbert Flack, and Sister Amelia of the Philadelphia hospital group, instigated the arrangements for the Course, which will consider both the theoretical and practical aspects of radioisotope techniques. It will include a study of radioactivity units and standards, radioactive decay and decay processes, instrumentation for the measurement of radioactivity, properties of radiation, statistical problems of radiation measurement, methods of radiation characterization, standardization and calibration of radioactive samples, and consideration of the problems of health physics and radiologic safety. Biological, chemical, medical and pharmaceutical applications, and special hospital techniques, including auto-radiography, kinetic studies and isotope dilution methods, will also be studied. Approximately 25 experiments utilizing special techniques required in the use of isotopes will be performed in the laboratory.

A similar radioisotopes techniques course offered by the College during the month of June was attended by twenty workers in various scientific fields. Among them were nine hospital pharmacists, two osteopathic physicians, two veterinary workers, a manufacturing pharmacist, a textile chemist, a toxicologist, a public health service surgeon, and two teachers.

Because of the interest generated by the initial course, this second session is being offered. Attendance will be limited to fifteen persons, all to be hospital pharmacists.

The fee for the Course is $75.00. Breakfast and lunch are available at the College Cafeteria at reasonable prices. A hotel is located nearby and reservations will be made by the College if requested. A banquet is planned for the final Thursday night, to be sponsored by the Philadelphia Hospital Pharmacists Association. Application for attendance may be made through the Registrar of the Philadelphia College of Pharmacy and Science, 43rd St., Kingsessing and Woodland Ave., Philadelphia 4, Pa.

therapeutic TRENDS

edited by LEO F. GODLEY

Chlorpromazine For Asthma

Ende, of Petersburg, Va., found chlorpromazine to be a safe sedative in the treatment of asthma. According to his report which appeared in *Am. Practitioner and Dig. Treatment* 6:710 (May) 1955, 12 patients with severe asthma were given 50 mg. intramuscularly; and improvement was noted in all but one patient in less than an hour. This therapy was thought to be life-saving in one of these patients.

Phthalamaquin In Asthma

Phthalamaquin, a derivative of 6 methoxy-4-amino quinolin, has both bronchodilating and antihistaminic properties. In addition, it has an affinity for the tissues of the respiratory tract.

Geschickter, of Georgetown University College of Medicine in Washington, reports his study on phthalamaquin in *Southern Med. J. 48*:497 (May) 1955. His work included some 500 patients with bronchial asthma; and with this therapeutic agent excellent results were obtained in 80 percent of the cases.

Concomitant therapy differed with the age groups in this study. The 240 children from 1 to 19 years of age were given antihistamines and antibiotics in addition to the basic therapy to obviate upper respiratory infection. In the young adult group, from 20 to 49 years of age, phthalamaquin therapy was increased during pollen and dust seasons since these agents are the chief offenders in this age group. In the 151 elderly adults (over 50 years of age) aminophylline or digitalis preparations were frequently given due to the frequent cardiac involvment encountered in this group. Phthalamaquin was supplied by the New York Quinine and Chemical Company.

Uterine Relaxing Factor For Premature Labor

The aqueous extractive from sow corpus luteum contains a uterine relaxing factor. This material was used effectively in delaying premature labor in 17 out of a series of 21 women.

Majewski and Jennings of Marquette School of Medicine published this report in *Obstet. and Gynecol. 5*:649 (May) 1955. The 21 women in this study were in labor; however, those who were dilated more than 3 cm. or those who terminated pregnancy due to abruptio placentae or central placenta pervia were not included in this study.

Patients were not informed as to the desired outcome of the therapy and they were prepared for vaginal delivery. Dosage of the uterine relaxing factor used was 4,000 units initially, then 3,000 units after one hour, and 1,000 units hourly thereafter until contractions ceased both clinically and symptomatically. There were no untoward symptoms from the therapy and the date of delivery for 3 of the 17 patients was after 28, 29, and 33 weeks; however 14 patients delivered between the 36th and 42nd week.

Intravenous Fat

Payne *et al* of New York Hospital-Cornell Medical Center describe a method for producing a colloidal suspension of animal fat for intravenous injection. This report, appearing in *Proc. Soc. Exper. Biol. Med. 89*:122 (May) 1955, represents a new approach to the old idea of intravenous fat.

The absence of an emulsifying agent eliminates reactions that might be encountered from that source. The particle size in the preparation used in this study is less than 250 microns; and therefore there is apparently little danger of capillary occlusion in the lungs or elsewhere. The solution may be autoclaved and can be stored indefinitely. It is compatible with electrolytes in isotonic concentrations.

No reactions were noted in patients who received up to 500 ml. of a 15 percent colloidal fat suspension. Clinical evaluation was not discussed in this report.

DAPT Permits Large Doses of Morphine

Shaw and associates in Australia reported the use of 2:4-diamino-5-phenylthiazole hydrobromide (DAPT) as a morphine antagonist in *Brit. Med. J.*

1:1367 (June 4) 1955. These investigators noted that DAPT administered concomitantly had no apparent effect on the analgesic qualities of morphine; but on the other hand, it elicited a pronounced lasting antagonism against its respiratory depression action. Large doses of morphine, to achieve greater analgesia, therefore can be made possible and safe.

The procedure outlined by these investigators provides for the gradual increase of morphine dosage in 16 mg. increments along with 15 mg. DAPT by intramuscular injection. The morphine dose should be increased until an analgesia is obtained lasting from six to eight hours unless respiratory depression occurs. Doses of morphine from 65 to 130 mg. should be given if possible. When a patient reaches the ideal stage of analgesia, he is said to be "stabilized." If the patient is unusually sedated during the day, an oral dose of 30-40 mg. DAPT may be given and 20 mg. during the night.

In this study, 35 patients with severe pain were satisfactorily managed on eight hour doses of morphine and DAPT.

New Antibiotic

Fuller of the National Institute for Medical Research in London describes in *Nature 175*:722 (April 22) 1955 the method of isolating an antibiotic from a spore-bearing bacillus of the *B. pumilis* group. Animal experiments demonstrated that the antibiotic was non-toxic and is effective against hemolytic streptococcal infection. It was more effective when given intraperitoneally than when given subcutaneously and it was not effective when given orally. *In vitro* experiments showed that in a nutrient broth, this new antibiotic inhibits *Staph. aureus* in a 1 in 20 million dilution and *Strep. hemolyticus* group A in a 1 in 18 million dilution.

Triethylene Thiophosphoramide In Carcinoma

In a series of 99 patients with far-advanced carcinomas, Bateman reported improvement in 88 percent when treated with triethylene thiophosphoramide. The drug was administered intramuscularly, intravenously, intra-arterially, intrapleurally, and intraperitoneally. It was also injected directly into the tumor mass. Individual doses ranged from 5 to 40 mg., varying with the weight of the patient, the size of the tumor, the hematologic picture, and clinical response to the drug. Doses were usually given at weekly intervals. Even in cases where disease symptoms were minimal or absent, the drug was given every three weeks because of recurrence of symptoms.

This report was published in *New Engl. J. Med. 252*:879 (May 26) 1955, and the investigator states that it is possible that certain forms of solid tumors may be controlled for indefinite periods on triethylene thiophosphoramide. Subjective and objective manifestations of improvement are: increase in sense of well-being, appetite improvement, weight gain, lessening of pain, control of pleural effusion and ascites, regression of tumor mass, recalcification of bone lesions, and control of neuropathies.

Triethylene thiophosphoramide was supplied by Lederle.

Posterior Pituitary Snuff For Nocturnal Enuresis

Four adolescent boys and girls who had persistent and frequent nocturnal enuresis were given doses of approximately 50 mg. of posterior pituitary snuff (a large pinch) in each nostril. These patient were adjudged normal on physical and psychiatric examinations.

In a 19 year old girl, nocturnal enuresis did not occur during 26 weeks of treatment; but did occur on 50 percent of nights during six weeks of placebo treatment. Distinct improvement was also noted in the other three patients in this study. This report was published in *Brit. Med. J. 1*:1194 (May) 1955. The posterior pituitary snuff was supplied by Messrs. Paines and Byrne Ltd.

Vitamin U For Gastric Ulcers

Cheney, of Stanford University College of Medicine, treated 81 patients with benign gastric ulcers by administering Vitamin U orally. The Vitamin U was given in the form of fresh raw cabbage juice. The dosage ranged from one to two liters daily given in six feedings.

X-ray examinations were made at 2-week intervals. In 3 patients, ulcers did not heal due to other pathological tissue conditions and in 18 others it was not possible to follow the healing progress; however, small ulcers in 36 patients in the group healed in 14.8 days. Large ulcers in 18 of the group healed in 22.9 days, and huge ulcers in 6 patients healed in 56.8 days.

This report was published in *Stanford Med. Bull. 13*:204 (May) 1955 and it is noted that the length of illness has no effect upon the healing time, but bedrest does tend to hasten recovery. Relapses responded to retreatment with Vitamin U and no carcinomas have occurred in the patients since completion of treatment.

This investigator is of the opinion that Vitamin U therapy should be tried in patients with gastric ulcers before recommending surgery.

timely drugs

Chlorostrep

. . . is a combination of two antibiotics, Chloromycetin and dihydrostreptomycin made available by Parke, Davis and Co. Chlorostrep is indicated in the treatment of susceptible enteritic infections; mixed infections encountered in bowel surgery; and anorectal tuberculosis. It is also used pre- and postoperatively in intestinal surgery to reduce incidence of infection and shorten healing time.

Chlorostrep Kapseals each contain 125 mg. Chloromycetin (chloramphenicol, Parke, Davis) and 125 mg. dihydrostreptomycin (as the sulfate). The suggested dosage of Chlorostrep in dysenteric enteritis is one to four Kapseals every six hours. Preoperatively, Chlorostrep should be given in a dosage of one to four Kapseals every six hours during three or four days before surgery and, when fluids are resumed, for five to six days after. In tuberculous patients, daily total dosage of Chlorostrep should be increased, or the usual dosage given over a longer period.

Cortril Vaginal Tablets

. . . (hydrocortisone) are available in specially shaped tablets containing 10 mg. of Cortril in a special Carbowax base. Cortril vaginal tablets are used to provide symptomatic relief in all types of vaginitis. The tablets are also a useful adjunct to the specific treatment of senile vaginitis and infections such as monilial and trichomonal vaginitis. Cortril vaginal tablets are supplied by Pfizer Laboratories.

Donna Extentabs

. . . for spasmolytic effect without sedation, are available from A. H. Robins Company, Richmond, Va. Each pink coated, extended action, tablet contains 0.3111 mg. hyoscyamine sulfate; 0.0582 atropine sulfate; and 0.0195 mg. hyoscine hydrobromide.

Meticortelone

. . . (prednisolone, Schering) is an analogue of hydrocortisone. A product of Schering Corporation, Meticortelone appears to have the same anti-inflammatory and antirheumatic properties as Meticorten with similarly diminished toxicity. Studies to date show that the new corticosteroid, as with Meticorten, is three to five times as effective milligram for milligram in rheumatoid arthritis as cortisone or hydrocortisone, yet is strikingly free from the major undesirable effects of the older compounds.

Pediatric Parenteral Solutions

. . . Mead Johnson and Company has announced the introduction of a new group of pediatric parenteral solutions and coordinated services to provide the first complete parenteral therapy program designed especially for infants and children. There are 31 solutions in the group, all packaged in special pediatric sizes of 125 ml., 250 ml., and 500 ml. Several of these are standard and specialty solutions contained in the Mead adult parenteral line and others are solutions prepared especially for pediatric use.

In addition to the full selection of children's sizes, the new line offers several unique mechanical refinements developed specifically to facilitate pediatric use.

New burette-type bottles are specially designed to provide greater safety and convenience. They are elongated to allow more minute measurement of fluid level. Calibrations on the side also are spaced more closely (at 10 ml. and 20 ml. intervals rather than the customary 50 ml. spacing) to allow more accurate measurement of closely defined pediatric doses.

New copyrighted labels are supplied on all of the pediatric solutions providing space for the patient's name, room number, and dosage instructions.

Pen-SF Capsules

. . . contain 200,000 units of potassium penicillin G, in combination with one third of the daily recommended dosage of the stress formula nutrients, ascorbic acid, thiamin mononitrate, riboflavin, niacinamide, pyridoxine, calcium pantothenate, vitamin B_{12} activity, folic acid and menadione. Pen-SF capsules are soft gelatin and orange-colored. Indicated for stress during infection, Pen-SF capsules are used to treat all infectious diseases caused by penicillin-susceptible organisms. The preparation provides simultaneous treatment for the patient under stress as well as antibiotic therapy for the infectious disease at little or no extra cost to the patient.

Steclin Oral Suspension

. . .(tetracycline calcium, Squibb) is now available in a new formula from E. R. Squibb and Sons. The new product requires no reconstitution and is ready to take by dropper or teaspoon. Because it is an aqueous rather than an oil suspension, the hazard of lipoid pneumonia is completely eliminated. Steclin suspension has a pleasant, neutral flavor and can be mixed with orange juice, milk, cola, formula, or a similar liquid of the patient's choice. Stable for eighteen months at room temperature, it is free-flowing and will not form a heavy precipitate at the bottom of the bottle. Therapeutic levels of this broad-spectrum antibiotic are attained within one hour of administration. Steclin Oral Suspension is supplied in 30 ml. bottles.

A dropper calibrated at 1 ml. is provided in the package. Each 1 ml. dropperful contains the equivalent of 50 mg. of tetracycline hydrochloride, and each 5 ml. teaspoonful the equivalent of 250 mg. of tetracycline hydrochloride.

Sterane

. . . (prednisolone) a product of Pfizer Laboratories, is a synthetic crystalline steroid hormone. It is an analog of hydrocortisone and is indicated in the treatment of rheumatic arthritis and such conditions as bronchial asthma, pemphigus vulgaris, acute disseminated lupus erythematosus, exfoliative dermatitis, atopic dermatitis, ulcerative colitis, periarteritis nodosa, scleroderma and dermatomyositis. In clinical trials, Sterane proved to be four to five times more potent than cortisone or hydrocortisone as an anti-rheumatic or anti-inflammatory agent. It is similar to cortisone or hydrocortisone in suppressing rheumatoid arthritis, but is quantitatively superior and relatively free of significant metabolic, water or electrolyte disturbances.

Sterane is administered orally and is available in 5 mg. tablets. In the clinical studies, the initial suppressive dose for rheumatoid arthritis averaged 30 mg. daily and the maintenance dose ranged from 5 mg. to 20 mg. Comparative hydrocortisone maintenance doses usually range from 30 mg. to 50 mg.

Theelin R-P

. . . is a new form of Theelin which is used to attain relief from menopausal symptoms. A product of Parke, Davis and Company, the new preparation provides a means of administering Theelin in both conjugated and nonconjugated forms for immediate and prolonged estrogenic therapy benefits. Theelin R-P is a combination of naturally-occurring Theelin in water-soluble and water-insoluble forms to provide rapid initial relief and prolonged estrogenic effect. It is supplied in 10 ml. Steri-Vials, each ml. containing 2 mg. of Theelin and 1 mg. of potassium theelin sulfate in physiologic sodium chloride solution.

Toclase Products

. . . available from Pfizer Laboratories, are new non-narcotic cough preparations which are being marketed in three dosage forms. Toclase is specifically designed to inhibit the overactive cough reflex by acting upon the medullary cough centers. It is available in combination with terpin hydrate as Toclase Expectorant Compound, and in tablets and as Toclase syrup.

Toclase citrate, a brand of carbetapentane citrate, has proved to be one and a half times as active in depressing the cough reflex as codeine. Each of the three dosage forms is indicated for specific conditions. Toclase expectorant compound has been found particularly desirable in rendering dry, useless coughing productive. Toclase citrate syrup acts as a simple antitussive, while Toclase tablets furnish a dosage convenient for the patient.

Tronolen Lotion

. . . is a highly-effective topical preparation recently made available by Abbott Laboratories. It has three distinct actions—anesthetic, antihistaminic and antipruritic. Tronolen is cosmetically pleasing, is neither greasy nor chalky and becomes almost invisible after it is applied. The product contains one percent Tronothane hydrochloride (pramoxine hydrochloride, Abbott) and two percent Di-Paralene hydrochloride (chlorcyclizine hydrochloride, Abbott).

Tronolen lotion is indicated for the relief of surface pain or itching in various dermatoses, pruritic syndromes, minor burns or sunburn, poison ivy, oak or sumac, insect bites, athlete's foot, abrasions, chafing, diaper rash, and scalds. The symptomatic relief provided by Tronolen lessens the possibility of secondary infection from scratching. The lotion is applied three or four times daily and prolonged use or application to extensive areas of the body is not recommended.

Tyzine Pediatric Nasal Drops

. . . (tetrahydrozoline hydrochloride) are for the relief of nasal congestion due to colds, allergies, etc. and are specifically designed for use in treating infants and younger children. Tyzine pediatric nasal drops is a product of Pfizer Laboratories.

Varidase, Intramuscular

. . . (streptokinase-streptodornase) is being offered for intramuscular use for the first time. Heretofore, the preparation has been used solely for local and topical application. Varidase is a product of Lederle Laboratories Division, American Cyanamid Company.

Clinical trials have shown that when injected intramuscularly, the streptokinase component of Varidase brings about a reversal of the process of inflammation and rapidly reduces swelling associated with bruises, wounds, operations, tooth extractions and infections. By promoting more rapid healing, hospitalization in many patients is thus shortened. When infection is present, the intramuscular Varidase will aid in allowing blood-borne antibiotics and chemotherapeutic agents to reach the site of the infection. A dosage of 5,000 units of streptokinase twice daily is recommended.

Wigraine

. . . is a new preparation for migraine headaches recently introduced by Organon. Wigraine provides total migraine therapy in each tablet by supplying four ingredients specifically indicated for treating the outstanding features of the migraine syndrome—head pain, nausea and vomiting, and residual muscle pain.

Each Wigraine tablet contains 1 mg. of ergotamine tartrate and 100 mg. of caffeine, to restore the cerebral vascular system to its normal tone and thus abort the head pain; 0.1 mg. of belladonna alkaloids, levorotatory (87.5 percent hyoscyamine and 12.5 percent atropine as sulfates), to alleviate the severe nausea and vomiting; and 130 mg. of acetophenetidin, to relieve residual pain in the occipital area resulting from sustained contractions of the skeletal muscles of the head and neck. These ingredients are combined in a tablet which disintegrates within seconds, providing quick relief through rapid utilization of its ingredients and keeping at a minimum the total dosage necessary for relief.

It is important that Wigraine be administered as early in the migraine attack as possible and in adequate dosage. A dose of two tablets should be given at the first sign of an attack, followed by one tablet every 20-30 minutes until the attack aborts. No more than six Wigraine tablets should be taken per migraine attack, and no more than twelve tablets during a period of one week.

CURRENT LITERATURE

edited by SISTER MARY ETHELDREDA, *St. Mary's Hospital, Brooklyn, N.Y.*

American Professional Pharmacist

JUNE, 1955—"Safeguards for the Preparation of Medications in Hospitals." Specific guides are outlined for pharmacists and nurses concerned with preparation and administration of medications.

page 546

Canadian Pharmaceutical Journal

JULY 1, 1955—"Pharmacy in the University Hospital," by J. L. Summers. A description of the Department of Pharmaceutical Services in the new University Hospital at University of Saskatchewan, Saskatoon. Includes details on Central Supply Service which is under the Department of Pharmaceutical Services. Also mentions pharmacist's role in training future hospital pharmacists and plans for an internship program.

page 8-412

Hospital Management

JUNE, 1955—"Sell Your Program to the Medical Staff," by Charles Letourneau, M.D. A physician points out ways in which methods improvement can be applied in hospital organization with particular reference to the medical staff. A statement is made concerning the Pharmacy Committee and the importance for reviewing procedures and methods.

page 54

JUNE, 1955—"A Pharmacist Looks at a C.S.-Pharmacy Combination," by Sister M. Teresa, O.S.F., Chief Pharmacist, St. Anthony Hospital, Oklahoma City, Okla. A pharmacist relates experiences and advantages in placing the Central Supply Department under the supervision of the Pharmacist.

page 76

The Hospital Pharmacist (Canada)

MAY-JUNE, 1955—"Economic Aspects of Large-Volume Intravenous Solutions—Part I," by William Laing. A study of the comparative costs of large-volume intravenous solutions purchased from Canadian commercial sources and the costs of the same solutions manufactured in hospitals. Included are lists of hospitals in Canada and the U.S. which have a Solutions Department.

page 150

Hospital Progress

JUNE, 1955—" 'Secundum Artem . . . ' A Tribute to Sister Ludmilla," by Sister M. Franciscana. Tribute is paid to a pharmacist who was the first Sister Member of the ASHP.

page 72

JULY, 1955—"Couriers Speed Pharmacy Service," by Sister M. Gonzales, R.S.M., Chief Pharmacist, Mercy Hospital, Pittsburgh, Pa. The advantages of a courier service in a 720-bed hospital are described. Details of how the operation is carried out in the daily routine are included.

page 88

JULY, 1955—"Seventh Annual Institute for Hospital Pharmacists." Complete report on C.H.A. Institute held in St. Louis in May.

page 61

J. Am. Pharm. Assoc., Pract. Pharm. Ed.

JUNE, 1955—"1955 A.Ph.A. Convention." Complete Convention report including resolutions passed by the American Pharmaceutical Association.

page 352

Military Medicine

JUNE, 1955—"The Role of the Pharmacy Committee in Drug Evaluation, Selection and Utilization and Its Importance to the Accreditation of the Hospital," by C. K. Himmelsbach. The important functions of the Pharmacy Committee are outlined in view of the many drugs now available.

page 413

JUNE, 1955—"The Accreditation Responsibilities of the Chief of a Pharmaceutical Service Relative to the Hospital Formulary and Controlled Drugs," by John A. Scigliano. Discussion of the formulary system pointing out that it is not merely a list of items in the manner of the traditional formulary, but primarily the incorporation of the principles of a sound but adjustable system of drug therapy.

page 417

JUNE, 1955—"Pharmaceutical Aspects Involved in Accreditation of Hospitals," by Charles Letourneau. A brief review of the standards of the Joint Commission on the Accreditation of Hospitals with particular reference to pharmaceutical services.

page 419

by GLENN SONNEDECKER
Secretary, American Institute of the History of Pharmacy

PERSPECTIVES in pharmacy

"THE PHARMACIST" IN MUSIC

MOST PHARMACISTS know the thrill of Joseph Haydn's music and share the friendly esteem held by Americans generally for the great Austrian composer. But how many who can hum at least a snatch of the "Surprise Symphony" are even aware that Haydn wrote an opera called "The Pharmacist"? Like other operas by Haydn, this one has been all but smothered by the popularity of his instrumental works. It now receives new musical life outside the pages of history through a recording of the opera, sung in English.*

"Papa" Haydn wrote "The Pharmacist" in 1768 while court composer and conductor to the princely house of Esterházy. The Esterházys had the happy tradition of zealously promoting music and other arts, backed by one of the greatest fortunes in all Hungary. The first performance of "The Pharmacist" echoed through the halls of a new castle that Haydn's prince, Nicholas the Magnificent, had built to rival the Palace of Versailles in France,—even though he already owned twenty-one other castles. Here Prince Nicholas maintained a private entourage of musicians headed by Haydn, who not only composed, but also produced and conducted the weekly performance of operas, orchestral works, and chamber music.

Haydn personally selected his singers, mostly from Italy, for the Italians then completely dominated the operatic field. The operas Haydn composed were, as they were expected to be, "Italian" in score and libretto. The libretto for "The Pharmacist," called in Italian "Lo Speziale," had been written by Carlo Goldoni, often considered one of the greatest Italian comedy writers of his time.

For Haydn, "Lo Speziale" apparently marked a kind of turning point in his operatic style. According to Karl Geiringer, "The composer now tried to combine both comic and serious elements; the beginning of such tendencies could be noticed in Lo Speziale (The Apothecary). In the seventies Haydn's comic operas were increasingly permeated with warmth and tenderness, his gay characters were more and more contrasted with serious and dignified figures and thereby a type of seriocomic or mixed opera was created, a type that Mozart was to develop to perfection."

Haydn's pharmacist was neither the first nor last to appear on the 18th-century operatic stage. Dominico Fischietti's "Lo Speziale" had its first performance (1755) thirteen years before Haydn's work. Christian G. Neefe, teacher of the young Beethoven, wrote in 1772 "The Pharmacy" (Die Apotheke"), a two-act comic opera. In 1786 first-nighters heard Karl Ditter von Dittersdorf's "Doktor und Apotheker," a sprightly opera dealing with a dispute between the two professions and assorted amours. J. C. Hadden has said the von Dittersdorf's "The Physician and Pharmacist" once even eclipsed the popularity of Mozart's operas.

Haydn's "Lo Speziale" continued to be sung from time to time. We know that Prince Nicholas sent his musicians to Vienna to give two performances only a year or two after its first performance at one of the elaborate social occasions at the castle of Esterháza. In the 19th century, Robert Hirschfeld translated the opera into German and condensed the three acts into one. This gained renewed attention for the opera, now called "Der Apotheker," although Geiringer maintains that some "changes made in Haydn's original version have gone too far."

The one-act version played opera houses in Dresden, Hamburg and Vienna at the end of the 19th century and was sung in 1909 as part of the celebration of the centenary of Haydn's death. Later, the "Schweizer Apothekerenensemble" of Fritz Lüdy-Tenger performed the opera in all the larger cities of Switzerland and in Salzburg, with this pharmacist-historian himself conducting. When "Der Apotheker" was performed at a pharmaceutical meeting at Hamburg in 1929, most of the singers and members of the orchestra were from the pharmaceutical profession. George Urdang, now Director of the American Institute of

*Available on a 33⅓ RPM record (two sides) from Magic-Tone Records, 545 Fifth Avenue, New York 17, N. Y.: Haydn, "Der Apotheker" ("The Apothecary"), Catalog No. MLO 1007, $4.56 postpaid ($5.95 list).

the History of Pharmacy, and one of his colleagues were instrumental in bringing this same cast to Berlin for a repeat performance the next year.

Another pharmacist, Hermann Gittner, with the help of other pharmacists in Halle, Germany, stimulated a production of the opera in 1952. Again, a pharmacist sang the title role, and a number of pharmacists were in the chorus. By this time the opera once more could be considered "a neglected piece of the cultural world."

This neglect and obscurity has now been eased for Americans through the recording of an English version prepared by William Kaye. Old Sempronio, his clerk Mengone, and Volpino all have romantic ambitions toward the beautiful Grilletta. Mengone sings,

When headaches give you agony
I've got the perfect remedy,
In common use for gastric juice disorder.

But as the comic opera unfolds, he announces,

Drugstores are bores;
Love has lured me
To its magic harbors.

And it is indeed Mengone whom Grilletta loves; in the end—for reasons that are not clear—true love triumphs. The "plot" is probably no more improbable and confusing than most operatic librettos. And while no one has ever called "The Pharmacist" one of Haydn's greater works, Geiringer considers "this piece one of the most attractive numbers of ensemble music in the pre-Mozart *opera buffa*."

Literature: This essay is based primarily upon the program notes for the performance of Haydn's "Der Apotheker" at Halle, Germany, October 27, 1952; and Karl Geiringer, "Haydn, A Creative Life in Music" (New York, 1946); also, A. Adlung and G. Urdang, "Grundriss der Geschichte der deutschen Pharmazie" (Berlin, 1935); J. C. Hadden, "Haydn" (London, 1911); and Marie Bobillier (tr., C. L. Leese), "Haydn" (London, 1926).

National Pharmacy Week—October 2-8

The American Pharmaceutical Association has again announced plans for the observance of National Pharmacy Week which is to be held during the week of October 2-8, 1955. Members of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS are again eligible to participate in the Display Contest sponsored by the A.Ph.A. Photographs of displays may be entered in the contest in the name of the hospital or clinic by the Hospital Administrator and Chief Pharmacist jointly. The best exhibit will receive a plaque suitable for hanging in a prominent place in the hospital. The rules for participating in National Pharmacy Week Display Contest are outlined below.

A mailing, giving additional information about National Pharmacy Week, will be sent to all members of the SOCIETY and Secretaries of affiliated chapters will receive additional material. Hospital pharmacists are urged to take this opportunity to carry out a public relations program during National Pharmacy Week. The American Pharmaceutical Association is making available material for press releases, speeches, radio programs, television programs outlined for observance of the week. A suggested talk entitled "The Hospital Pharmacist—Unseen But Essential," is available on request from the A.Ph.A.

Rules For Display Competition

GENERAL

1. Competition is limited to members of the American Pharmaceutical Association. In instances where a photograph is entered in the name of a retail pharmacy rather than be an individual, a member of the American Pharmaceutical Association must be associated with the firm, either as an owner or as an employee, and must have had a part in the planning of the display.

2. Each display must exhibit the window strip entitled "National Pharmacy Week, October 2-8, 1955," which the American Pharmaceutical Association will supply.

3. Displays will be judged on the basis of:
   (a) Value and effectiveness of the message to the public
   (b) Originality
   (c) Professional character, arrangement, and details
   (d) Conformity to theme

4. Displays must be entirely professional in their concept. Any emphasis on commercial implications must be avoided.

5. Photographs submitted must be 8- by 10-inch glossy prints.

6. Pharmacy Week displays that have been entered in former years are ineligible.

HOSPITALS AND CLINICS

1. General Rules 1 to 6, inclusive, apply to the Hospitals and Clinics Competition, which is limited to displays or exhibits planned and installed in hospital or clinic lobbies or other hospital or clinic areas open to the general public.

2. The entry must be submitted in the name of the hospital or clinic by the hospital administrator and chief pharmacist jointly.

3. Only one photograph from each hospital or clinic may be entered.

4. Photographs of displays must be mailed to the American Pharmaceutical Association, 2215 Constitution Avenue, N. W., Washington 7, D. C., on or before December 15, 1955. Entries mailed after that date will not be accepted in the competition.

5. As soon as possible after December 15, 1955, a national committee of judges will meet to select the best three exhibits in this group. The best exhibit will receive a plaque suitable for hanging in a prominent place in the hospital or clinic, and the other two will receive certificates of merit.

ASHP affiliates

Western New York Society

Members of the Western New York Society of Hospital Pharmacists met for the final meeting of the year on Monday Evening, May 17 at the Park Lane Restaurant in Buffalo. The Society members were guests of the E. R. Squibb Company for the dinner and social evening.

Business transacted included election of officers for the coming year. It is anticipated that the luncheon meetings will be continued in the fall on the second Tuesday of the month.

Houston Area Society

The Houston Area Society of Hospital Pharmacists met at the V.A. Hospital in Houston on April 24. Business covered at the meeting included instructions to delegates attending the ASHP Annual Meeting and discussion regarding plans for organizing an A.Ph.A. Branch in Southeast Texas. The group adopted the following resolution to be presented to the Council of the American Pharmaceutical Association:

"*Whereas* an organization of the members of the American Pharmaceutical Association in the Southeast Area of Texas has applied for a charter to become the Southeast Texas Branch of the American Pharmaceutical Association,

"*Be it resolved* that the Houston Area Society of Hospital Pharmacists endorse the application for the aforementioned charter."

Included on the program were the following papers:

"A Procedure for Detecting the Dilution of Meperidine Hydrochloride in Multiple Dose Vials," by James D. McKinley, Jr.

"Drug Effects on Rat Brain Glycogen," by Jacqueline Claus.

"Cortical and Subcortical Brain Injection of Drugs," by Don Kroeger.

The May 2 meeting of the Houston Area Society was devoted to a review of papers presented at the ASHP Annual Meeting and reports by the delegates, Mr. James McKinley and Miss Adela Schneider.

Texas Society

The secretary of the Texas Society, Mrs. Jean Sheffield, has recently issued a Bulletin to the members of the state group. Announcement was made of tentative plans for holding an institute in Austin in 1956, results of the election of officers for 1956, and participation of members of the Texas Society on committees of the national organization.

Also, every member of the Texas Society has been sent a copy of the revised constitution and By-Laws and the History prepared by Miss Adela Schneider.

Southeastern Society

Tentative plans for the Semi- Annual Meeting of the Southeastern Society of Hospital Pharmacists have been announced. The meeting will be held at the Tutwiler Hotel in Birmingham, Ala., on Saturday and Sunday, October 1 and 2. Members of the Local Committee include Perry E. Cox, *Chairman;* Lillie Mazarra, Howard Clem, and Lillian Price.

The program includes discussions on electrolyte therapy, hospital law, public relations, trends in pharmaceutical education, and the status of the Salk Polio Vaccine.

Northern California Society

"Dental Medications," was the title of a discussion presented by Dr. Valdo Herby at the May 10 meeting of the Northern California Society of Hospital Pharmacists. The meeting was held at St. Francis Hospital in San Francisco at 8:15 P.M. The host was Mr. Al Schwabe, Chief Pharmacist.

Business transacted during the meeting included a report on the ASHP Annual Meeting by Mr. Claude Busick, a report on a salary survey by Mr. George Selwig, and information on the Status of the Constitution and By-Laws by Mr. Eric Owyang.

The special topic presented for an open discussion covered medications taken home by patients when the pharmacist is not on duty.

The June 15 meeting of the Northern California Society was held jointly with the Northern California A.Ph.A. Branch. The principal speaker was Mr. Milton T. Duffy, Chief, Bureau Food and Drug Inspection, California State Department of Public Health. He spoke on the "California Food and Drug Inspection Program." The meeting was held at the U. S. Public Health Service Hospital in San Francisco.

Southern California Society

Frederick D. Newbarr, M.D., Chief Autopsy Surgeon, Los Angeles County Coroner's Office, was guest speaker for the Southern California Society of Hospital Pharmacists meeting on June 15. Dr. Newbarr's topic was "Responsibility of the Coroner's Office to the Community." The meeting was held at the Queen of Angels Hospital Auditorium with Mr. Joe Ball presiding. Sister Junilla acted as hostess for the evening.

St. Louis Association

The May meeting of the Hospital Pharmacists' Association of Greater St. Louis was held at Firmin Desloge Hospital on Tuesday, May 10 at 8 P.M. During the meeting there was a general discussion regarding distribution of the Salk Polio Vaccine. There were also discussions on the ASHP Annual Meeting and the A.Ph.A. Convention which was held in Miami Beach, Fla. early in

Participants in Panel Discusssion—Northeastern New York Society. LEFT TO RIGHT: *Caryl Heeder, Columbia Memorial Hospital, Hudson, N. Y.; Louis Jeffrey, Albany Hospital, Albany, N. Y.; Violet Spaulding, Memorial Hospital, Albany, N. Y.; Benjamin Teplitsky, V. A. Hospital, Albany, N. Y.; Frank J. Smith,* MODERATOR, *Chief, Narcotic Control Section, New York State Department of Health; David Curley, G. D. Searle and Co.; Clarence Hayes, The Upjohn Company; and Joseph Peluso, Ciba Pharmaceutical Products, Inc.*

May. Delegates from the St. Louis group attending included Miss Jacquelyn Block and Sister Mary Berenice.

The program for the meeting included a film on electrolytes which was presented by Mr. Jack McCanna of Cutter Laboratories.

Oregon Society

Members of the Society of Hospital Pharmacists of the State of Oregon met at St. Vincent's Hospital in Portland on June 8 at 8 P.M. Business transacted included tentative plans for the October (1955) meeting, a report on legislation, and election of new officers.

North Carolina Society

Members of the North Carolina Society of Hospital Pharmacists met at The Moses H. Cone Memorial Hospital in Greensboro on Saturday night, July 9. Mr. Claude Paoloni, Chief Pharmacist, acted as host.

The program included the following papers:

"Accidental Poisoning in Children," by James W. Mitchener, Cabarrus Memorial Hospital, Concord.

"Treatment of Poisoning in Children," by Edward P. Benbow, Jr., M.D., Department of Pediatrics, Cone Memorial Hospital, Greensboro.

"Interpretation of Narcotic Regulations Pertaining to Hospital—Claim for Drawback on Tax-Paid Alcohol," by Wesley T. Collier, University of North Carolina School of Pharmacy, Chapel Hill.

Northeastern New York Society

On Thursday evening, May 26, a panel discussion on "Hospital Pharmacists and Drug Detail Men—As They See Each Other," was conducted at a joint meeting of the medical representatives and the hospital pharmacists at the Veterans Administration Hospital in Albany. Participants in the panel are listed along with the photograph shown above.

Following the discussion, Mr. Louis Jeffrey, who had been a delegate of the Chapter to the ASHP Annual Meeting, presented a review of meetings and functions he had attended. The business session also included election of officers for the new year.

Rhode Island Society

Members of the Rhode Island Society met for the last meeting of the year on June 9 at Johnson's Hummocks in Providence. Highlighting the meeting was presentation of a scroll naming Professor Russell E. Brillhart of the Rhode Island School of Pharmacy an honorary life member of the Rhode Island Society of Hospital Pharmacists.

The principal speaker at the meeting was Mr. Albert J. Perchard of the E. R. Squibb Company who discussed dangers associated with the use of antibiotics.

Washington State Hospital Pharmacists

Mrs. Evlyn Gray Scott, Chief Pharmacist at St. Luke's Hospital in Cleveland, Ohio, was the speaker for the June 7 meeting of the Washington State Hospital Pharmacists. She discussed "Projects," with particular reference to the role of the affiliated chapters in studying the Point Rating Plan, evaluation of internship programs, and the proposed National Hospital Formulary Service.

Following a dinner sponsored by Pfizer Laboratories, a business session, and program, President George Gruber presented the gavel to the incoming Vice-President, Miss Ruth Brown. The incoming President, Mr. Theodore Taniguchi, was unable to be present.

Wisconsin Society

The Wisconsin Society of Hospital Pharmacists met at the Milwaukee County Hospital on April 21. Following a tour of the parenteral solutions room, Dr. Anthony Piscottix, Assistant Professor of Medicine at Marquette University, gave a talk on "Chemotherapy of Leukemias." He discussed the various types of leukemia and the form of treatment in each case.

During the business session announcements were made regarding plans for the hospital pharmacy sessions to be held in conjunction with the Convention of the Wisconsin Pharmaceutical Association in Madison, May 31-June 2.

Indiana Chapter

The Indiana Chapter of the ASHP met in conjunction with the Convention of the Indiana Pharmaceutical Association in French Lick on June 21. Officers elected for the new year include Glen Sperandio, *President;* Charles Schrieber, *Vice-President*; and Eileen Foley, *Secretary-Treasurer.*

Oklahoma Society

Sister M. Teresa, delegate to the ASHP Annual Meeting, presented a report at the May 25 meeting of the Oklahoma Society of Hospital Pharmacists. The meeting was held in the Library of St. Anthony Hospital in Oklahoma City.

During the business session a letter was read from Herbert L. Flack regarding the graduate program and residency in hospital pharmacy at the Jefferson Medical College, Philadelphia.

as the president sees it

CLAUDE BUSICK
St. Joseph's Hospital Stockton, California

I believe it was Grover Bowles who said that we had realized the majority of people who would join the SOCIETY automatically. We now need a definite plan to sell the SOCIETY to the non-member. As you know our quota for this year is 600 new members. That means that each SOCIETY member must sell one-fourth of a new member. Have you lined up your sales talk? What can you add to these advantages of being a member of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS?

1. Close contacts with other specialties in the profession as the result of affiliating with the American Pharmaceutical Association.
2. The Scientific and Practical editions of the A.Ph.A. Journal and THE BULLETIN of the ASHP.
3. Headquarters is ever ready to help with individual problems.
4. Freedom of the editorial policy of THE BULLETIN.

Long-Range Projects in the Making—

1. Hospital Formulary Service.
2. Pharmacy Service Guidance for small hospitals.
3. Procedure Manual for hospital pharmacies.
4. Group Insurance for the membership.
5. Career Booklet for hospital pharmacists.

TRAVEL

Since January 1 I have flown 30,000 miles. Three of the trips have been from coast to coast, others to Texas, St. Louis and Chicago. The experience gained has been more than worthwhile, and the pleasure of meeting members most heart warming.

On June 11 I attended a meeting of the Joint Committee of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS and the American Hospital Association in Chicago. Both groups will realize benefits from the cooperative plans engendered at this meeting.

WORK-SHOP

Los Angeles, July 29, 30, and 31. Covered the workshop sessions at the University of Southern California. The program was a splendid one and member response was enthusiastic. I took greetings from the SOCIETY, and gave a short talk on "The Importance of Hospital Pharmacy Organization."

INSTITUTES

Vancouver, B.C., August 13 and 14. Be a good neighbor. I hope to see some of you at the First Institute on Hospital Pharmacy sponsored by the Canadian Society at the University of British Columbia, Vancouver B.C. August 13 and 14.

Atlanta, Georgia, August 22 thru 26. Plans are completed for an excellent program at the Atlanta Hospital Pharmacy Institute. I'm eagerly anticipating sharing the stimulating experience of this institute with many of you.

NEW U.S. PHARMACOPEIA

The 15th revision of the *Pharmacopeia* will become official December 15th, 1955. My first association with this book was with the 8th revision. The amazing strides of pharmacy are contained in the revisions between the 8th and 15th. This recent revision covers the newest antihistamines, antibiotics, endocrine preparations, and radioactivity. It is a far cry from the Acacia to Ginger in my battered old 8th edition.

VACATIONS

The vacation season is upon us. Make the most of it whether you get out of town or stay home to catch up with the year's collection of odds and ends. The dog days are all too short.

C. L. Busick

NEWS

John T. Murphy Awarded Degree

Mr. John T. Murphy, Chief Pharmacist, Massachusetts General Hospital, Boston, Massachusetts, has recently been awarded an honorary degree of Doctor of Pharmacy from the Massachusetts College of Pharmacy. Mr. Murphy is a member of the American Pharmaceutical Association and the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS. He has participated in numerous activities of the SOCIETY and is a past-president of the Massachusetts Society of Hospital Pharmacists. Mr. Murphy is also the author of a number of publications and several of his papers have appeared in THE BULLETIN.

Professor Leslie M. Ohmart, in presenting the degree, cited Mr. Murphy's 33 years service with the Massachusetts General Hospital, first as a staff member, then as Assistant Chief Pharmacist and for the past 11 years, as Chief Pharmacist.

1955 Whitney Lecture Award

Miss Gloria Niemeyer, Secretary of the AMERICAN SOCIETY OF HOSPITAL PHARMACISTS, was the recipient of the 1955 H.A.K. Whitney Lecture Award. The Award, established in honor of the first chairman of the SOCIETY, is presented annually by the Michigan Society to an individual who has made outstanding contributions in the field of hospital pharmacy.

The testimonial dinner was held at The Whittier Hotel in Detroit on June 9 with Mrs. Jane Rogan presiding. Greetings were brought by Dr. Don E. Francke representing the Division of Hospital Pharmacy of the A.Ph.A. and the ASHP, and the Award was presented by Mr. Arlie Tennant, President of the Michigan Society. The subject of the lecture presented by Miss Niemeyer was "Responsibilities of Affiliated Chapters of the ASHP."

Miss Niemeyer's activities in the SOCIETY include Associate Editor of THE BULLETIN since 1945, Assistant Director of the Division of Hospital Pharmacy since 1947, and Secretary of the SOCIETY since 1949.

Superstine with West Company

Edward Superstine, formerly Assistant Chief Pharmacist at Duke University Hospital, Durham, N. C., has recently accepted a position with the Hospital Division of the West Disinfecting Company, Long Island City, N. Y. Mr. Superstine holds a Master of Science degree from the University of Michigan Graduate School with an internship in hospital pharmacy at University Hospital, Ann Arbor. At the West Company, he will be associated with the Hospital Division.

Harrell Honored

Mr. Charles T. Harrell, Sales Manager, Bristol Laboratories, was honored at the April meeting of the Southeastern Society of Hospital Pharmacists. Formerly from Atlanta, Mr. Harrell was presented a plaque in recognition of his outstanding cooperation and interest in the Southeastern Society in particular and hospital pharmacy in general.

Geiger Heads Pfizer Hospital Sales

E. Burns Geiger has been appointed Director of Hospital Sales and Promotion of Pfizer Laboratories, Division of Chas. Pfizer & Co., Inc. Mr. Geiger formerly was Director of Trade Relations for Pfizer and served as Government Sales Manager of J. B. Roerig & Co. Prior to joining Pfizer, Mr. Geiger was Director of Pharmacy Service of the Veterans Administration in Washington.

Other appointments and re-assignments in the Hospital Sales Department recently announced include: Norman Bullard, Hospital Sales Administrator; Charles Gill, Field Supervisor; Boyd Neubourne, Manager, Government Contract Sales; Donald C. Riley, Manager, Professional Relations; and Ollie Murnane, Field Supervisor, Professional Relations.

Bristol Pricing Digest Revised

The second revision of Bristol's "Systematic Prescription Pricing Digest," has recently been released. The Digest is for the convenience of practicing pharmacists and students as a *guide* to rational prescription pricing. It is not proposed or intended as a standard pricing plan.

This second revision, based on the original Digest by Dr. W. Paul Briggs, has been prepared by Dr. Milton L. Neuroth of the School of Pharmacy of the Medical College of Virginia, Richmond, Va. In revising the Digest, consideration was given to current costs and pricing trends.